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(FILE 'HOME' ENTERED AT 16:47:29 ON 27 DEC 2004)
     FILE 'REGISTRY' ENTERED AT 16:47:33 ON 27 DEC 2004
L1
                STRUCTURE UPLOADED
L2
                QUE L1
L3
             42 S L2
           6646 S L2 SSS FUL
L4
L5
           373 S L4 AND NRS<3
           6273 S L4 NOT L5
    FILE 'CAPLUS' ENTERED AT 16:49:15 ON 27 DEC 2004
L7
           193 S L6
    FILE 'REGISTRY' ENTERED AT 16:51:02 ON 27 DEC 2004
    FILE 'CAPLUS' ENTERED AT 16:51:21 ON 27 DEC 2004
     FILE 'REGISTRY' ENTERED AT 16:52:28 ON 27 DEC 2004
               STRUCTURE UPLOADED
^{\text{L8}}
L9
                QUE L8
                STRUCTURE UPLOADED
L10
L11
                QUE L10
L12
             50 S L9 SUB=L6 SAM
           1253 S L9 SUB=L6 FUL
L13
            11 S L11 SUB=L6 SAM
L14
            244 S L11 SUB=L6 FUL
L15
           1469 S L13 OR L15
L16
     FILE 'CAPLUS' ENTERED AT 16:54:48 ON 27 DEC 2004
L17
            91 S L16
            ANALYZE L17 1- RN HIT:
L18
                                       287 TERMS
     FILE 'REGISTRY' ENTERED AT 16:55:18 ON 27 DEC 2004
L19
           100 S 327065?/RN
           1100 S 74875?/RN
L20
L21
           1100 S 75561?/RN
L22
           100 S 104924?/RN
L23
            100 S 109030?/RN
L24
            100 S 109051?/RN
L25
              2 S L16 AND L19
L26
              5 S L16 AND L20
L27
              2 S L16 AND L21
L28
              1 S L16 AND L22
L29
              1 S L16 AND L23
L30
              1 S L16 AND L24
           1461 S L16 NOT (L26 OR L27 OR L28)
L31
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L32
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L33
             55 S L32 AND PATENT/DT
             30 S L32 NOT L33
L34
L35
             1 S L34 AND 2004/SO
L36
             1 S L34 AND 2003/SO
L37
             0 S L34 AND 2002/SO
L38
             1 S L34 AND 2001/SO
L39
            82 S L32 NOT (L35 OR L36 OR L38)
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L1

STR

Structure attributes must be viewed using STN Express query preparation. L2 QUE ABB=ON PLU=ON L1

=> d 19

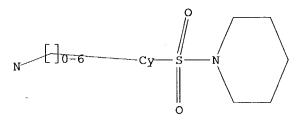
L9 HAS NO ANSWERS

 $^{\text{L8}}$ 

STR

Structure attributes must be viewed using STN Express query preparation. L9  $$\tt QUE \ ABB=ON \ PLU=ON \ L8$$ 

=> d 111 L11 HAS NO ANSWERS L10 STR



G1 0,S

Structure attributes must be viewed using STN Express query preparation. L11 QUE ABB=ON PLU=ON L10

=> => d ibib abs hitstr 139 1-82
YOU HAVE REQUESTED DATA FROM FILE 'CAPLUS' - CONTINUE? (Y)/N:y

ACCESSION NUMBER:

2004:965231 CAPLUS

DOCUMENT NUMBER:

141:410933

TITLE:

Preparation of [1,2,4]triazole-3-thiones as inhibitors

of myeloperoxidase for the treatment of

neuroinflammatory disorders

INVENTOR(S):

Svensson, Mats; Tiden, Anna-Karin; Turek, Dominika

PATENT ASSIGNEE(S): SOURCE:

AstraZeneca AB, Swed. PCT Int. Appl., 107 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

GΙ

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PA.	PATENT NO.					D	DATE	7	j	APPL	ICAT:	ION	NO.		Di	ATE	
WO	2004	0967	81		A1	<del></del>	2004	1111	1	WO 2	004-	SE61	8		20	0040	 422
	W:	AE,	AG,	AL,	AM,	AT,	AU,	AZ,	BA,	BB,	BG,	BR,	BW,	BY,	BZ,	CA,	CH,
		CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,
		GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	ΚZ,	LC,
	LK, LR, LS				LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NA,	NI,
	NO, NZ, OM				PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	SY,
	TJ, TM, TN				TR,	TT,	TZ,	UA,	UG,	US,	UZ,	VC,	.VN,	YU,	ZA,	ZM,	ZW
	RW:	BW,	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	AZ,
		BY,	KG,	ΚZ,	MD,	RU,	ТJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,
	BY, KG, KZ ES, FI, FF				GB,	GR,	HU,	ΙE,	IT,	LU,	MC,	NL,	PL,	PT,	RO,	SE,	SI,
	SK, TR, BF					CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,
	TD, TG																
PRIORITY	RITY APPLN. INFO.:								:	SE 2	003-:	1232		ļ	A 20	0030	425

$$N-NH$$
 $Y-X-W$ 
 $N-NH$ 
 $S$ 
 $Q$ 
 $Q$ 
 $I$ 

AB [1,2,4]Triazole-3-thiones I [Q, Y = (un)substituted Ph, naphthyl, mono- or bicyclic heteroaryl, alkyl, heterocyclylalkyl, heteroarylalkyl, cycloalkyl; W = bond, CHR1; X = bond, O, CH2, NH, (alkyl)N; R1 = H, Me, F, HO, HOCH2, Ph] such as II are prepared as inhibitors of myeloperoxidase for the treatment of neuroinflammatory disorders. Stirring 2-chlorophenylacetic acid hydrazide and 4-fluorophenyl isocyanate at room

temperature in isopropanol for 1-21 h, precipitation of a solid by pouring the reaction

mixture onto ice, addition of the solid to aqueous  $2 \mbox{\$}$  sodium hydroxide solution along

with methanol and stirring at reflux for 2 h, and cooling and neutralization of the mixture with 2M HCl yields II in 81% yield. I inhibit myeloperoxidase with IC50 values of < 60  $\mu M$  (data given for four compds.); for example, II inhibits myeloperoxidase with an IC50 value of 3.9  $\mu M$ . Processes for preparing I from thiosemicarbazides and esters, acids, or acid chlorides, from isothiocyanates and acyl hydrazides, or from isocyanates and acyl hydrazides followed by thionation with Lawesson's reagent are claimed.

IT 791716-54-6P 791716-55-7P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(invention compound; preparation of [1,2,4]triazole-3-thiones as inhibitors

of

myeloperoxidase for the treatment of neuroinflammatory disorders) 791716-54-6 CAPLUS

RN 791716-54-6 CAPLUS
(CN Piperidine, 1-[[4-[1,5-dif

Piperidine, 1-[[4-[1,5-dihydro-3-[(4-hydroxyphenyl)methyl]-5-thioxo-4H-1,2,4-triazol-4-yl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN 791716-55-7 CAPLUS

CN Piperidine, 1-[[4-[3-[(2,5-dimethoxyphenyl)methyl]-1,5-dihydro-5-thioxo-4H-1,2,4-triazol-4-yl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

REFERENCE COUNT:

THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS

RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

ANGWED 2

A9 ANSWER 2 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: DOCUMENT NUMBER:

2004:878302 CAPLUS

TITLE:

141:360694 Combination therapy using an  $11\beta$ -hydroxysteroid

dehydrogenase type 1 inhibitor and an antihypertensive

agent for the treatment of metabolic syndrome and

related diseases and disorders

INVENTOR(S):

Kampen, Gita Camilla Tejlgaard; Andersen, Henrik Sune

PATENT ASSIGNEE(S): SOURCE:

Novo Nordisk A/S, Den. PCT Int. Appl., 297 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

7

PATENT INFORMATION:

PA'	PATENT NO.						DATE			APPI	CICAT	ION 1	NO.		D	ATE	
WO	2004 W: RW:	AE, CN, GE, LK, NO, TJ, BW, BY,	AG, CO, GH, LR, NZ, TM, GH, KG, FI, TR,	CR, GM, LS, OM, TN, GM, KZ, FR,	CU, HR, LT, PG, TR, KE, MD, GB,	AT, CZ, HU, LU, PH, TT, LS, RU, GR,	DE, ID, LV, PL, TZ, MW, TJ, HU,	AZ, DK, IL, MA, PT, UA, MZ, TM, IE,	BA, DM, IN, MD, RO, UG, SD, AT, IT,	BB, DZ, IS, MG, RU, US, SL, BE, LU,	2004- BG, EC, JP, MK, SC, UZ, SZ, BG, MC, GN,	BR, EE, KE, MN, SD, VC, TZ, CH, NL,	BW, EG, KG, MW, SE, VN, UG, CY, PL,	ES, KP, MX, SG, YU, ZM, CZ, PT,	BZ, FI, KR, MZ, SK, ZA, ZW, DE, RO,	CA, GB, KZ, NA, SL, ZM, AM, DK, SE,	406 CH, GD, LC, NI, SY, ZW AZ, EE, SI,
PRIORIT	Y APP	LN.	INFO							DK 2 DK 2 DK 2 DK 2 DK 2 US	003- 003- 003- 003- 003- 003- 003- 003-	566 567 569 571 46729 46739 46749 46749 46749 4676 777442 9889 9988 48609 48609 48609 48609 48609	62P 63P 37P 53P 50P 21P 57P 78P 94P 95P		A 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2	0030/ 003/ 003/ 003/ 003/ 003/ 003/ 003/ 003/ 003/ 003/ 003/ 003/	411 411 411 411 411 502 502 502 502 502 502 502 502

US 2004-537099P

P 20040116

OTHER SOURCE(S):

MARPAT 141:360694

AB The invention discloses combination therapy comprising the administration of an  $11\beta$ -hydroxysteroid dehydrogenase type 1 inhibitor and an antihypertensive agent useful for treating, preventing and reducing the risk of developing insulin resistance, dyslipidemia, obesity, hypertension and other related diseases and disorders.

IT 327065-73-6

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(hydroxysteroid dehydrogenase inhibitor-antihypertensive agent combination for treatment of metabolic syndrome and related conditions)

RN 327065-73-6 CAPLUS

CN 2-Furancarboxamide, N-[4-[(4-methyl-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

ACCESSION NUMBER: 2004:878301 CAPLUS

DOCUMENT NUMBER: 141:360721

TITLE:

Combination therapy using an  $11\beta$ -hydroxysteroid dehydrogenase type 1 inhibitor and a glucocorticoid

receptor agonist to treat cancer and

inflammation-associated diseases and to minimize the side effects associated with glucocorticoid receptor

agonist therapy

INVENTOR(S):

PATENT ASSIGNEE(S): SOURCE:

Kampen, Gita Camilla Tejlgaard; Andersen, Henrik Sune

Novo Nordisk A/S, Den. PCT Int. Appl., 305 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent English

LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT	NO.	KIND	DATE	APPLICATION NO.		DATE
WO 2004 W:	AE, AG, AL, CN, CO, CR, GE, GH, GM, LK, LR, LS, NO, NZ, OM, TJ, TM, TN, BW, GH, GM, BY, KG, KZ, ES, FI, FR,	CU, CZ HR, HU LT, LU PG, PH TR, TT KE, LS MD, RU GB, GR	DE, DK, ID, IL, LV, MA, PL, PT, TZ, UA, MW, MZ, TJ, TM, HU, IE,	WO 2004-DK248 BA, BB, BG, BR, BW, DM, DZ, EC, EE, EG, IN, IS, JP, KE, KG, MD, MG, MK, MN, MW, RO, RU, SC, SD, SE, UG, US, UZ, VC, VN, SD, SL, SZ, TZ, UG, AT, BE, BG, CH, CY, IT, LU, MC, NL, PL, CM, GA, GN, GQ, GW,	ES, FI KP, KI MX, M3 SG, SI YU, ZA ZM, ZV CZ, DI PT, RO	I, GB, GD, R, KZ, LC, Z, NA, NI, K, SL, SY, A, ZM, ZW W, AM, AZ, E, DK, EE, O, SE, SI,
PRIORITY APP	•			DK 2003-565 DK 2003-566 DK 2003-568 DK 2003-569 DK 2003-570 DK 2003-571 US 2003-467284P US 2003-467362P US 2003-467363P US 2003-467443P US 2003-467453P US 2003-467800P DK 2003-776 DK 2003-776 DK 2003-778 US 2003-475157P US 2003-475195P DK 2003-988 DK 2003-988 DK 2003-988 DK 2003-989 DK 2003-990 DK 2003-990 DK 2003-990 DK 2003-998 US 2003-486078P US 2003-486095P US 2003-486097P US 2003-486098P	A A A A A P P P P P A A A A A A P P P P	20030411 20030411 20030411 20030411 20030411 20030502 20030502 20030502 20030502 20030502 20030502 20030522 20030522 20030622 20030602 20030602 20030630 20030630 20030630 20030710 20030710 20030710 20030710 20030710

DK 2003-1910 A 20031222 DK 2004-9 A 20040106 US 2004-537099P P 20040116

OTHER SOURCE(S):

MARPAT 141:360721

AB The invention discloses combination therapy comprising the administration of an  $11\beta$ -hydroxysteroid dehydrogenase type 1 inhibitor and a glucocorticoid receptor agonist for treating some forms of cancer, diseases and disorders having inflammation as a component, and to minimize the side effects associated with glucorticoid receptor agonist therapy. IT 327065-73-6

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(hydroxysteroid dehydrogenase inhibitor-glucocorticoid agonist combination to treat cancer and inflammation-associated diseases and minimize side effects associated with glucocorticoid agonist therapy)

RN 327065-73-6 CAPLUS

CN 2-Furancarboxamide, N-[4-[(4-methyl-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

9 ANSWER 4 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2004:872724 CAPLUS

DOCUMENT NUMBER:

141:366223

TITLE:

Pharmaceutical use of substituted amides as

 $11\beta$ -hydroxysteroid dehydrogenase type 1

modulators, especially inhibitors, for treating

metabolic

INVENTOR(S):

Andersen, Henrik Sune; Kampen, Gita Camilla Tejlgaard;

Christensen, Inge Thoger; Mogensen, John Patrick;

Larsen, Annette Rosendal; Kilburn, John Paul

PATENT ASSIGNEE(S):

SOURCE:

Novo Nordisk A/S, Den. PCT Int. Appl., 236 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PA	PATENT NO.						DATE		ä	APPL	ICAT	ION 1	NO.		D	ATE	
WO	2004	0894	70		A2		2004		Ī	wo 2	004-	DK25	 0		2	0040	406
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		CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,
		GE,	GH,	GM,	HR,	HU,	ID,	ĮL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	KZ,	LC,
		LK,	LR,	LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NA,	NI,
		NO,	NZ,	OM,	PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	SY,
		ТJ,	TM,	TN,	TR,	TT,	TZ,	UA,	UG,	US,	UZ,	VC,	VN,	YU,	ZA,	ZM,	zw
	RW:	BW,	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	AZ,
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		SK,	TR,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,
		TD,	TG													•	
PRIORIT	Y APP	LN.	INFO	.:							003-					0030	
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AB The invention is directed to the use of substituted amides of formula R3CONR1R2 (I), and their optical isomers or mixture of optical isomers, including racemates, and tautomers, their prodrugs, pharmaceutically acceptable salts, [wherein R1 = (un)substituted cyclo/hetcyclo/aryl/hetaryl/alkyl, het/aryl, etc.; R2 = H, (un)substituted aryl/cycloalkyl/alkylcarboxy/alkyl, het/aryl; or R1NR2 = (un)substituted (un)saturated bi/tricyclic ring containing 4-10 carbons, and 0-2 heteroatoms;

R3 =

(un) substituted cyclo/hetcyclo/aryl/alkyloxy/hetaryl/arylalkyl/alkyl, alkenyl, alkynyl, het/aryl] for modulating, especially inhibiting, the activity of  $11\beta$ -hydroxysteroid dehydrogenase type 1 ( $11\beta$ -HSD1) and use of their pharmaceutical compns. in the treatment, prevention, prophylaxis of a range of medical disorders where a decreased intracellular concentration of active glucocorticoid is desirable. The invention is also directed to the preparation of certain title compds. I. For instance, acylation of 1H-benzimidazole-5-carboxylic acid with N-cyclohexyl-N-methylamine in THF in the presence of HOBT/EDAC/DIPEA gave amide II in 49% yield. Pyrazole-4-carboxamide (III) inhibited  $11\beta$ -HSD1 enzyme with an IC50 = 0.04  $\mu$ M. I are useful for treating metabolic disorders, type II diabetes, impaired glucose tolerance, impaired fasting glucose, dyslipidemia, obesity, hypertension, diabetic late complications, neurodegenerative and psychiatric disorders and adverse effects of treatment or therapy with glucocorticoid receptor agonists.

327065-73-6P, Furan-2-carboxylic acid N-[4-[(4-methylpiperidin-1-yl)sulfonyl]phenyl]amide

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(drug candidate; preparation of substituted amides as  $11\beta$ -hydroxysteroid dehydrogenase type 1 modulators, especially inhibitors, for treating metabolic disorders, type II diabetes and related diseases) 327065-73-6 CAPLUS

2-Furancarboxamide, N-[4-[(4-methyl-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN

CN

ANSWER 5 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2004:718536 CAPLUS

DOCUMENT NUMBER: 141:243546

TITLE: Preparation of N-heterocyclyl-substituted

amino-thiazole derivatives as protein kinase

inhibitors
INVENTOR(S): Alegria, La

Alegria, Larry Andrew; Chong, Wesley Kwan Mung; Chu,

Shaosong; Duvadie, Rohit Kumar; Li, Lin; Romines,

William Henry, III; Yang, Yi

PATENT ASSIGNEE(S):

SOURCE:

Pfizer Inc., USA

PCT Int. Appl., 307 pp.

CODEN: PIXXD2
Patent

DOCUMENT TYPE:

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.					KIN	D -	DATE		_		ICAT:					ATE	
		2004				A1		2004	0902								*	
		W:	ΑE,	ΑE,	AG,	ΑL,	ΑL,	AM,	AM,	AM,	AT,	AT,	AU,	AZ,	AZ,	BA,	BB,	BG,
			BG,	BR,	BR,	BW,	BY,	BY,	BZ,	BZ,	CA,	CH,	CN,	CN,	co,	CO,	CR,	CR,
			CU,	CU,	CZ,	CZ,	DE,	DE,	DK,	DK,	DM,	DZ,	EC,	EC,	EE,	EE,	EG,	ES,
			ES,	FI,	FI,	GB,	GD,	GE,	GE,	GH,	GM,	·HR,	HR,	HU,	HU,	ID,	IL,	IN,
	IS, JP, JI				JP,	KE,	KE,	KG,	KG,	KP,	KP,	ΚP,	KR,	KR,	ΚZ,	ΚZ,	KZ,	LC,
	LK, LR, LS					LS,	LT,	LU,	LV,	MA,	MD,	MD,	MG,	MK,	MN,	MW,	MX,	MX,
	MZ, MZ, NA					NI												
	MZ, MZ, NA RW: BW, GH, GI					KE,	LS,	MW,	ΜZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AT,	BE,
			BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	FI,	FR,	GB,	GR,	HU,	ΙE,	IT,	LU,
			MC,	NL,	PT,	RO,	SE,	SI,	SK,	TR,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,
	MC, NL, PT GQ, GW, ML				ML,	MR,	NE,	SN,	TD,	TG,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,
GQ, GW, ML					ML,	MR,	NE,	SN,	TD,	TG								
PRIORITY APPLN. INFO.:					.:					٠ ٦	JS 2	003-	4488	43P	1	2 20	0302	221
OTHER SOURCE(S):					MAR	TAS	141:	24354	16									

$$R^{1}-N$$
 $N$ 
 $S$ 
 $R^{2}$ 
 $R^{2}$ 
 $R^{2}$ 
 $R^{2}$ 

AB The title aminothiazole compds. with N-containing cycloalkyl at the 2-amino position [I; N-containing heterocyclyl = (un)substituted N-containing 3-10 membered heterocyclyl; Rl = H, alkyl, alkenyl, alkoxy, etc.; R2 = (un)substituted alkyl, cycloalkyl, alkoxy, aryl, 4-10 membered heterocyclyl] and their pharmaceutically acceptable prodrugs or salts which modulate and/or inhibit the cell proliferation and activity of protein kinases, were prepared Thus, reacting [4-amino-2-(piperidin-4-ylamino)thiazol-5-yl](2,6-difluorophenyl)methanone (preparation given) with 1-methylpiperidine-4-carboxylic acid afforded 65% II which showed Ki of 0.46 μM against CDK2, Ki of 0.13 μM against CDK4, and IC50 of >5 μM in HCT-116 assay for cell growth inhibition. Biol. data were given for over 1100 compds. I. The pharmaceutical compns. comprising the compound I are claimed.

750577-40-3P

IT

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of N-heterocyclyl-substituted amino-thiazole derivs. as protein kinase inhibitors)

RN 750577-40-3 CAPLUS

CN Benzamide, N-[[5-[[4-[[4-amino-5-(2,6-difluorobenzoyl)-2-thiazolyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

REFERENCE COUNT:

3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

39 ANSWER 6 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2004:696365 CAPLUS

DOCUMENT NUMBER: 141:225301

TITLE: Preparation of 3-(benzoylureido)thiophenes as glycogen

phosphorylase inhibitors.

INVENTOR(S): Schoenafinger, Karl; Defossa, Elisabeth; Von Roedern,

Erich; Kadereit, Dieter; Herling, Andreas; Burger, Hans-joerg; Klabunde, Thomas; Wendt, Karl-ulrich

PATENT ASSIGNEE(S): Aventis Pharma Deutschland GmbH, Germany

SOURCE: PCT Int. Appl., 38 pp.

CODEN: PIXXD2

DOCUMENT TYPE: LANGUAGE: Patent German

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PA'	PATENT NO.					D	DATE				ICAT					ATE	
WO	2004	0720	60		A1	_	2004	 0826									
	W:	ΑE,	ΑE,	AG,	ΑL,	AL,	AM,	AM,	AM,	AT,	AT,	AU,	ΑZ,	ΑZ,	BA,	BB,	BG,
		BG,	BR,	BR,	BW,	BY,	BY,	BZ,	ΒZ,	CA,	CH,	CN,	CN,	co,	CO,	CR,	CR,
		CU,	CU,	CZ,	CZ,	DE,	DE,	DK,	DK,	DM,	DZ,	EC,	EC,	EE,	EE,	EG,	ES,
		ES,	FI,	FI,	GB,	GD,	GE,	GE,	GH,	GM,	HR,	HR,	HU,	HU,	ID,	IL,	IN,
		IS,	JP,	JP,	KE,	KE,	ĶG,	KG,	KP,	KP,	KP,	KR,	KR,	KZ,	KZ,	KZ,	LC,
	LK, LR, LS			LS,	LS,	LT,	LU,	LV,	MA,	MD,	MD,	MG,	MK,	MN,	MW,	MX,	MX,
	MZ, MZ, NA			NA,	NI												
	RW: BW, GH, G			GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AT,	BE,
		BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	FI,	FR,	GB,	GR,	HU,	IE,	IT,	LU,
											ВJ,						
		GQ,	GW,	ML,	MR,	ΝE,	SN,	TD,	TG,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,
		GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG								
DE	DE 10306502				A1		2004	0909		DE 2	003-	1030	6502		2	0030	217
US	US 2004198742						2004	1007		US 2	004-	7803	4 4		2	0040	217
PRIORIT	RIORITY APPLN. INFO.:									DE 2	003-	1030	6502	7	A 2	0030	217
										US 2	003-	48750	02P	]	2	0030	715
OTHER SO	THER SOURCE(S):					TAS	141:	22530	01								

GI

$$R^{5}$$

$$R^{1}$$

$$R^{2}$$

$$R^{3}$$

$$R^{4}$$

$$R^{2}$$

$$R^{4}$$

$$R^{2}$$

$$R^{4}$$

$$R^{2}$$

$$R^{4}$$

$$R^{2}$$

$$R^{4}$$

$$R^{5}$$

$$R^{2}$$

$$R^{4}$$

$$R^{2}$$

$$R^{4}$$

$$R^{5}$$

$$R^{5$$

AB Title compds. [I; R1 = H, F, Cl, Br; R2 = R1, alkyl, CF3, OCF3, NO2,

Page 16

CN

cyano, alkoxy, alkylcarbonyl, CO2H, CONH2, alkylsulfonyl A, etc.; R3 = H, alkyl, alkylsulfonyl, (substituted) alkylphenyl, Ph, phenylsulfonyl, etc.; R4 = H, alkyl, alkoxycarbonyl alkylsulfonyl, (substituted) alkylphenyl, piperidinylsulfonyl, piperazinylsulfonyl; R5 = F, Cl, Br; A = Q1-Q4; X = O, NH; Y = OH, NH2; Z = OH, alkoxy, NH2, alkylamino, dialkylamino], were prepared Thus, 5-(3-aminothiophen-2-yl)-3H-[1,3,4]-oxadiazol-2-one hydrochloride (preparation given) and 2-chloro-4,5-difluorobenzoyl isocyanate were stirred 3 h in MeCN to give 1-(2-chloro-4,5-difluorobenzoyl)-3-[2-(5-oxo-4,5-dihydro-[1,3,4]-oxadiazol-2-yl)thiophen-3-yl]urea. This inhibited glycogen phosphorylase a with IC50 = 0.03  $\mu$ M.

IT 745835-24-9P 745835-33-0P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of 3-(benzoylureido)thiophenes as glycogen phosphorylase inhibitors)

RN 745835-24-9 CAPLUS

4-Piperidinecarboxylic acid, 1-[3-[[[(2-chloro-4,5-difluorobenzoyl)amino]carbonyl]amino]-5-(1-piperidinylsulfonyl)-2-thienyl]-(9CI) (CA INDEX NAME).

RN 745835-33-0 CAPLUS

CN Benzamide, 2-chloro-4,5-difluoro-N-[[[2-(1-piperidinyl)-5-(1-piperidinylsulfonyl)-3-thienyl]amino]carbonyl]- (9CI) (CA INDEX NAME)

10/070,954

ANSWER 7 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2004:428910 CAPLUS

DOCUMENT NUMBER:

141:7027

TITLE:

Preparation of 2-pyridone derivatives as inhibitors of

neutrophile elastase

INVENTOR(S):

Bladh, Hakan; Klingstedt, Tomas; Larsson, Joakim; Lawitz, Karolina; Lepistoe, Matti; Loenn, Hans;

Nikitidis, Grigorios

PATENT ASSIGNEE(S): SOURCE:

Astrazeneca AB, Swed. PCT Int. Appl., 187 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.						D :	DATE		i	APPL:	ICAT:	ION I	.OV		D	ATE		
	WO	2004	0439:	24		A1	- :	2004	0527	Ī	WO 2	003-	SE17:	 39		20	0031	111	
		W:	ΑE,	AG,	AL,	AM,	AT,	AU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,	
			co,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,	GE,	
			GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	ΚZ,	LC,	LK,	
			LR,	LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NI,	NO,	NZ,	
	OM, PG, P					PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	SY,	.TJ,	TM,	
	TN, TR, T					TZ,	UA,	UG,	US,	UZ,	VC,	VN,	YU,	ZA,	ZM,	ZW			
	RW: GH, GM, K					LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	ΑM,	ΑZ,	BY,	
			KG,	ΚZ,	MD,	RU,	ТJ,	TM,	ΑT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	
	KG, KZ, MD FI, FR, GB					GR,	HU,	IE,	IT,	LU,	MC,	NL,	PT,	RO,	SE,	SI,	SK,	TR,	
	BF, BJ, CF					CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG	
PRIO	PRIORITY APPLN. INFO.:										SE 2	002-	3348		Ï	A 20	0021	112	
•	•										SE 2	003-3	388		7	A 20	0030	212	
											SE 2	003-2	2120		7	A 20	0030	722	
^ M***	CHILD COLLD CD (C)					***	- T -	2 4 2 4	7007										

OTHER SOURCE(S):

MARPAT 141:7027

GI

$$\begin{array}{c|c}
 & O \\
 & \downarrow & \downarrow \\
 & \downarrow$$

AB Title compds. I [X = O, S; Yl = N, CR2 and when Rl = OH, Yl may also, in the tautomeric form, represent NR6; Y2 = CR3 and when Yl = CR2, then Y2 may also represent N; Rl = H, alkyl; R2 = H, halo, alkyl; R3 = H, F; Gl = Ph, 5-6 membered heterocycle, etc.; R5 = H, halo, alkyl, etc.; n = 1-3; R4, R6 = H, alkyl, etc.; L = O, amino, alkyl, etc.; G2 = Ph, phenoxy, etc.] are prepared For instance, Et 3-[(4-chlorophenyl) amino]-3-oxopropanoate is reacted with 4-methoxy-3-buten-2-one (EtOH, NaOMe, reflux, 5 h) to give Et 1-(4-chlorophenyl)-6-methyl-2-oxo-1,2-dihydropyridine-3-carboxylate. This intermediate is saponified and coupled to 4-chlorobenzylamine (NMP, HBTu, HOBt, DIEA) to give II. Selected compds. have IC50 < 30 μM for human neutrophil elastase. I are useful in the treatment of inflammatory disorders.

II

IT 694482-56-9P, 6-Methyl-2-oxo-N-[4-(piperidin-1-ylsulfonyl)benzyl]1-[3-(trifluoromethyl)phenyl]-1,2-dihydropyridine-3-carboxamide
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU
(Therapeutic use); BIOL (Biological study); PREP (Preparation); USES
(Uses)

(preparation of 2-pyridone derivs. as inhibitors of neutrophile elastase) 694482-56-9 CAPLUS

CN 3-Pyridinecarboxamide, 1,2-dihydro-6-methyl-2-oxo-N-[[4-(1-piperidinylsulfonyl)phenyl]methyl]-1-[3-(trifluoromethyl)phenyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & & & \\ & & & \\ N & & \\ S & & \\ & & \\ O & & \\ \end{array}$$
 CH<sub>2</sub>-NH-C NH-C NH-C NH-C

3

REFERENCE COUNT:

THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS

RN

ANSWER 8 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2004:308396 CAPLUS

DOCUMENT NUMBER: 140:339072

TITLE: Preparation of benzamide derivatives as LPA receptor

antagonists

INVENTOR(S): Terakado, Masahiko; Nakade, Shinji; Seko, Takuya;

Takaoka, Yoshikazu

PATENT ASSIGNEE(S): Ono Pharmaceutical Co., Ltd., Japan

SOURCE: PCT Int. Appl., 304 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PA'	PATENT NO.					D	DATE		j	APPL	ICAT	ION I	NO.		D.	ATE	
WO	2004	0311	18		A1	_	2004	0415	1	WO 2	003-	JP66	80		2	0030	 528
	W:	ΑE,	AG,	AL,	AM,	ΑT,	AU,	AZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,
							DK,										
		GM,	HR,	HU,	·ID,	IL,	IN,	IS,	JP,	ΚE,	KG,	KR,	ΚZ,	LC,	LK,	LR,	LS,
	LT, LU, L					MD,	MG,	MK,	MN,	MW,	MX,	ΜZ,	NI,	NO,	NZ,	OM,	PH,
	PL, PT, R					SC,	SD,	SE,	SG,	SK,	SL,	ТJ,	TM,	TN,	TR,	TT,	TZ,
	PL, PT, R UA, UG, U					VC,	VN,	YU,	ZA,	ZM,	zw						
	RW:	GH,	GM,	KE,	LS,	MW,	ΜZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	AZ,	BY,
		KG,	ΚZ,	MD,	RU,	ТJ,	TM,	ΑT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,
		FI,	FR,	GB,	GR,	HU,	IE,	IT,	LU,	MC,	NL,	PT,	RO,	SE,	SI,	SK,	TR,
	FI, FR, GE BF, BJ, CF					CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG
PRIORITY	RIORITY APPLN. INFO.:									JP 2	002-	2911:	37	1	A 2	0021	003
OTHER SO	THER SOURCE(S):				MAR	PAT	140:	3390	72								
GI	• •																

AB The title compds. I [wherein R = (un)substituted aliphatic hydrocarbyl or cyclyl; G = a bond or a spacer; T = CH2 or a spacer; J = N or CH; B = (un)substituted aliphatic hydrocarbyl or cyclyl; K = a bond or a spacer; Q = a bond or a spacer; ring D = (un)substituted cyclic ring; L = a bond or a spacer; ring E = (un)substituted cyclic ring; n = 0 or 1; M = a bond or a spacer; Z = a acid group] or prodrugs, or salts thereof are prepared as lysophosphatidic acids (LPA) receptor antagonists. For example, the compound II was prepared in a multi-step synthesis. II showed inhibitory activity with IC50 of 0.095 μM against human EDG-2. I are useful for the treatment of urinary diseases, cancer-related diseases, proliferative diseases, inflammatory immune diseases, diseases caused by secretion failures, brain-related diseases, etc. (no data). Formulations containing I as an active ingredient were also described.

IT 679793-04-5P

RL: PAC (Pharmacological activity); RCT (Reactant); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)

(drug candidate; preparation of benzamide derivs. as LPA receptor antagonists)

RN 679793-04-5 CAPLUS

CN 2-Piperidinecarboxylic acid, 1-[[4-[[(3,5-dimethoxy-4-methylbenzoyl)(3-phenylpropyl)amino]methyl]phenyl]sulfonyl}-, methyl ester (9CI) (CA INDEX NAME)

### IT 679793-05-6P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(drug candidate; preparation of benzamide derivs. as LPA receptor antagonists)

RN 679793-05-6 CAPLUS

2-Piperidinecarboxylic acid, 1-[[4-[[(3,5-dimethoxy-4-methylbenzoyl)(3-phenylpropyl)amino]methyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

CN

36

REFERENCE COUNT:

THERE ARE 36 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

9 ANSWER 9 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2004:290470 CAPLUS

DOCUMENT NUMBER:

140:297550

TITLE:

Methods and compositions using small organic molecules for modification of splicing of pre-mRNA, screening

method, and therapeutic use

INVENTOR(S):

Kole, Ryszard

PATENT ASSIGNEE(S):

University of North Carolina At Chapel Hill, USA

PCT Int. Appl., 45 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

SOURCE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.				KINI	D	DATE		i	APPL	ICAT:	ION 1	. O <i>l</i>		Di	ATE		
	WO	2004	0284	54		A2	-	2004	0408	1	WO 2	003-1	JS30	423		2	0030	
	WO	2004	0284	54		A3		20040	0708									
		W:	ΑE,	AG,	AL,	AM,	AT,	ΑU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,
		CO, CR, C GH, GM, H			CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,	GE,
	GH, GM, HI			HR,	HU,	ID,	IL,	IN,	IS,	JΡ,	ΚE,	KG,	ΚP,	KR,	ΚZ,	LC,	LK,	
	LR, LS, LT			LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NI,	NO,	NZ,	
	OM, PG, PH			PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	SY,	TJ,	TM,	
			TN,	TR,	TT,	TZ,	UA,	UG,	US,	UZ,	VC,	VN,	YU,	ZA,	ZM,	zw		٠.
		RW:	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	ΑZ,	BY,
			KG,	ΚZ,	MD,	RU,	TJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,
			FI,	FR,	GB,	GR,	ΗU,	IE,	IT,	LU,	MC,	NL,	PT,	RO,	SE,	SI,	SK,	TR,
	BF, BJ, CF			CF,	CG,	CI,	CM,	GΑ,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG	
	US 2004137472					<b>A</b> 1		20040	0715	1	US 2	003-	6725	01		2	0030	926
PRIO	RIORITY APPLN. INFO.:									1	US 2	002-	4141	41P	]	P 20	0020	927

AB The invention provides a method for preventing a splicing event in a pre-mRNA mol., comprising contacting the pre-mRNA and/or elements of the splicing machinery with a small mol. compound identified according to the methods of the invention to prevent the splicing event in the pre-mRNA mol. Also provided is a method for inducing a splicing event in a pre-mRNA mol., comprising contacting the pre-mRNA and/or elements of the splicing machinery with a small mol. compound identified according to the methods of the invention to induce the splicing event in the pre-mRNA mol. Furthermore, a method is provided for treating a patient having a disorder associated with an alternative or aberrant splicing event in a pre-mRNA mol., comprising administering to the patient a therapeutically effective amount of a compound identified according to the methods of the invention to prevent an alternative or aberrant splicing event in a pre-mRNA mol., thereby treating the patient.

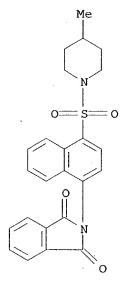
IT 419539-02-9

RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(small organic mols. for modification of splicing of pre-mRNA, screening method, and therapeutic use)

RN 419539-02-9 CAPLUS

CN Piperidine, 1-[[4-(1,3-dihydro-1,3-dioxo-2H-isoindol-2-yl)-1-naphthalenyl]sulfonyl]-4-methyl- (9CI) (CA INDEX NAME)



ANSWER 10 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2004:269913 CAPLUS

DOCUMENT NUMBER: 140:287277

TITLE: Preparation of carboxylic acid derivatives that

inhibit the binding of integrins to their receptors Biediger, Ronald J.; Chen, Qi; Decker, E. Radford; Holland, George W.; Kassir, Jamal M.; Li, Wen; Market,

Robert V.; Scott, Ian L.; Wu, Chengde; Li, Jian

PATENT ASSIGNEE(S): USA

U.S. Pat. Appl. Publ., 98 pp., Cont.-in-part of U.S. SOURCE:

Ser. No. 707,068.

CODEN: USXXCO

DOCUMENT TYPE:

INVENTOR(S):

Patent English

LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 2004063955	A1	20040401	US 2001-973142	20011009
ZA 2001008777	A	20030124	ZA 2001-8777	20011024
NZ 515252	Α	20040130	NZ 2001-515252	20011102
NO 2001005394	Α	20020507	NO 2001-5394	20011105
EP 1203766	A2	20020508	EP 2001-125494	20011106
EP 1203766	A3	20041208		
R: AT, BE, CH,	DE, DK	, ES, FR, GB	, GR, IT, LI, LU, NL,	, SE, MC, PT,
IE, SI, LT,	LV, FI	, RO, MK, CY	, AL, TR	
TR 200103179	A2	20020621	TR 2001-200103179	20011106
CN 1412181	Α	20030423	CN 2001-145182	20011229
JP 2003119181	A2	20030423	JP 2002-31953	20020208
PRIORITY APPLN. INFO.:			US 1999-132971P	P 19990507
^			US 2000-565920	A2 20000505
			US 2000-707068	A2 20001106
			US 2001-973142	A 20011009
OMILED GOILD GE (G)	147 D D 7 M	140 007077		

OTHER SOURCE(S):

MARPAT 140:287277

GΙ

AB The invention relates to a method for the inhibition of the binding of  $\alpha4\beta1$  integrin to its receptors [e.g., VCAM-1 (vascular cell adhesion mol.-1) and fibronectin], compds. that inhibit this binding, and the use of such compds. for the control or prevention of diseases states in which  $\alpha4\beta1$  is involved. The claims include compds. of general formula I [n is 3-10; Y is CO, N, CR1, CR2R3, NR5, CH, O, S; A is O, S, CR16R17, NR6; E is CH2, O, S, NR7; J is O, S, NR8; T is CO, (CH2)0-3; M is R9R10, (CH2)0-3; L is O, NR11, S, (CH2)0-1; X is CO2B, PO3H2, SO3H, SO2NH2, SO2NHCOR12, OPO3H2, CONHCOR13, CONHSO2R14, OH, tetrazolyl, H; W is C, CR15, N; B, R1-R17 are H, halo, alkyl, alkoxy, acyl, CF3, CO2H, etc.]. Thus, pyridine-containing 3-aminopropionic acid derivative II was prepared by a multistep procedure and showed IC50 = 10 nM in

fibronectin inhibition assay.

## IT 422516-68-5P

а

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of carboxylic acid derivs. that inhibit the binding of integrins to their receptors)

RN 422516-68-5 CAPLUS

CN Benzenepropanoic acid, β-[[[1-[[2-chloro-5-(1piperidinylsulfonyl)phenyl]methyl]-1,2-dihydro-4-hydroxy-5-methyl-2-oxo-3pyridinyl]amino]carbonyl]amino]-4-methyl-, (βS)- (9CI) (CA INDEX
NAME)

Absolute stereochemistry.

#### IT 422519-63-9P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(preparation of carboxylic acid derivs. that inhibit the binding of integrins to their receptors)

RN 422519-63-9 CAPLUS

CN Piperidine, 1-[[4-chloro-3-[(2,3-dihydro-7-methyl-2,4-dioxooxazolo[4,5-c]pyridin-5(4H)-yl)methyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

9 ANSWER 11 OF 82

CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: DOCUMENT NUMBER:

2004:252512 CAPLUS

DOCUME

140:287376

TITLE:

Preparation of pyrazolo[3,4-b]pyridines as

phosphodiesterase inhibitors for treatment of COPD,

asthma, or allergic rhinitis

INVENTOR(S):

Allen, David George; Coe, Diane Mary; Cook, Caroline Mary; Dowle, Michael Dennis; Edlin, Christopher David; Hamblin, Julie Nicole; Johnson, Martin Redpath; Jones, Paul Spencer; Knowles, Richard Graham; Lindvall, Mika Kristian; Mitchell, Charlotte Jane; Redgrave, Alison

Judith; Trivedi, Naimisha; Ward, Peter

PATENT ASSIGNEE(S):

SOURCE:

Glaxo Group Limited, UK PCT Int. Appl., 293 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent English

LANGUAGE:

Englis

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

•	PATENT NO.					KIN	D	DATE		i	APPL	ICAT:	ION	NO.		D.	ATE		
		2004						2004		. 1	WO 2	003-	EP11	814		2	0030	912	
	WO	2004				<b>A</b> 3		2004						:					
	,	W:	ΑE,	ΑG,	AL,	AM,	ΑT,	ΑU,	ΑZ,	ΒA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,	
			co,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FI,	GB,	GD,	GE,	
			GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	KZ,	LC,	LK,	
			LR,	LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NI,	NO,	NZ,	
	OM, PG, P					PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	SY,	ТJ,	TM,	
	TN, TR, T					TZ,	UA,	UG,	US,	UZ,	VC,	VN,	YU,	ZA,	ZM,	zw			
	RW: GH, GM, K				KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	AZ,	BY,	
,	RW: GH, GM, KI KG, KZ, MI				MD,	RU,	TJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	
			FI,	FR,	GB,	GR,	HU,	IE,	IT,	LU,	MC,	NL,	PT,	RO,	SE,	SI,	SK,	TR,	
			BF,	ВJ,	CF,	CG,	CI,	CM,	GΑ,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG	
PRIOR	RTI	APP	LN.	INFO	.:					(	GB 2	002-2	2145	5	i	A 2	0020	916	
	PRIORITY APPLN. INFO.:									(	GB 2	002-	3004	5	i	A 2	0021	223	
										(	GB 2	003-	6595		i	A 2	0030	321	
										(	GB 2	003-	8017		i	A 2	0030	407	
·										(	GB 2	003-	1970	8	i	A 2	0030	821	
										(	GB 2	003-	2107	4	i	A 2	0030	909	
OTHER	OTHER SOURCE(S):					MAR	PAT	140:	2873	76									

Ι

II

GÏ

AB Title compds. I [wherein R1 = (fluoro)alkyl, (CH2)2OH, (CH2)2CO2-alkyl; R2 = HMe, fluoroalkyl; R3 = (un)substituted cycloalkyl, cycloalkenyl, or heterocyclyl; X = NR4R5, OR5a; R4 = H, (fluoro)alkyl, (un)substituted cycloalkyl(alkyl); R5 = substituted alkyl, acyl(alkyl), carboxy(alkyl), carbamoyl(alkyl), sulfamoyl(alkyl), alkylsulfonyl(alkyl), or cyano(alkyl); R5a = (fluoro)alkyl, cycloalkyl(alkyl), substituted Ph; and salts thereof] were prepared as phosphodiesterase (PDE) inhibitors, in particular PDE4 inhibitors. The invention also provides for the use of I or pharmaceutically acceptable salts thereof for the treatment and/or prophylaxis of an inflammatory and/or allergic disease, such as chronic obstructive pulmonary disease (COPD), asthma, or allergic rhinitis. For example, 4-chloro-1-ethyl-N-(4-fluorophenyl)1H-pyrazolo[3,4-b]pyridine-5carboxamide (preparation given) was coupled with 4-aminotetrahydropyran in EtOH using TEA to give II. The latter inhibited human recombinant PDE 4B with a pIC50 of 7.9 and suppressed LPS-induced pulmonary neutrophilia in rats with an ED50 in the range of about 0.5 mg/kg to about 2 mg/kg. In the rat pica model of emesis, II exhibited pica response values (ED50 ranging from 4.8 mg/kg to 40 mg/kg) higher than the neutrophilia-inhibition doses and displayed a therapeutic index >2. Thus, II showed anti-inflammatory effects with low emetic side effects.

IT 675116-31-1P, 1-Ethyl-N-[3-(1-piperidinylsulfonyl)phenyl]-4[(tetrahydro-2H-pyran-4-yl)amino]-1H-pyrazolo[3,4-b]pyridine-5-carboxamide
675116-39-9P, 1-Ethyl-N-[4-(1-piperidinylsulfonyl)phenyl]-4[(tetrahydro-2H-pyran-4-yl)amino]-1H-pyrazolo[3,4-b]pyridine-5-carboxamide
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU
(Therapeutic use); BIOL (Biological study); PREP (Preparation); USES
(Uses)

(PDE4 inhibitor; preparation of pyrazolo[3,4-b]pyridines as PDE4 inhibitors for treatment of inflammatory and/or allergic disease)

RN 675116-31-1 CAPLUS

CN 1H-Pyrazolo[3,4-b]pyridine-5-carboxamide, 1-ethyl-N-[3-(1-piperidinylsulfonyl)phenyl]-4-[(tetrahydro-2H-pyran-4-yl)amino]- (9CI) (CA INDEX NAME)

RN 675116-39-9 CAPLUS

CN 1H-Pyrazolo[3,4-b]pyridine-5-carboxamide, 1-ethyl-N-[4-(1-piperidinylsulfonyl)phenyl]-4-[(tetrahydro-2H-pyran-4-yl)amino]- (9CI) (CA INDEX NAME)

ANSWER 12 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2004:182862 CAPLUS

DOCUMENT NUMBER:

140:217665

TITLE:

Preparation of piperidinylphthalazinone derivatives as

PDE4 inhibitors

INVENTOR(S):

Hatzelmann, Armin; Barsig, Johannes; Marx, Degenhard; Kley, Hans-Peter; Christiaans, Johannes A. M.; Menge, Wiro M. P. B.; Sterk, Geert Jan; Weinbrenner, Steffen

PATENT ASSIGNEE(S):

SOURCE:

Altana Pharma A.-G., Germany

PCT Int. Appl., 48 pp. CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATE	PATENT NO.					D	DATE		i	APPL:	ICAT:	ION	NO.		Di	ATE		
WO 2	2004	0184	49		A1		2004	0304	1	WO 2	003-	EP86	73		2	0030	806	
WO 2	2004	0184	49		C1		2004	0506										
	W: AE, AL, A					BR,	CA,	CN,	CO,	DZ,	EC,	GE,	HR,	ID,	IL,	IN,	IS,	
	JP, KR, L					MA,	MK,	MX,	NO,	NZ,	PH,	PL,	SG,	TN,	UA,	US,	VN,	
	YU, ZA, ZV RW: AM, AZ, BY						MD,	RU,	ТJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	
							GB,											
PRIORITY	SI, SK, TR PRIORITY APPLN. INFO.:								]	EP 2	002-	1797	9	7	A 20	00208	810	
OTHER SOU	OTHER SOURCE(S):					PAT	140:	2176	65									
GT	, ,																	

\* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT \*

AΒ The title compound I [R1, R2 = H or together form an addnl. bond; R3 = benzene derivative Q1 or Q2; R4 = (substituted)arylsulfonyl; R5 = alkoxy or polyfluoroalkyoxy; R6, R7 = (cyclo)alkoxy, cycloalkylmethoxy, or polyfluoroalkyoxy; R8 = alkyl; R9 = H or alkyl; or R7 and R8 together with the 2 intervening C atoms form a spiro-linked 5-, 6- or 7-membered hydrocarbon ring, optionally interrupted by O or S] were prepared as PDE4 inhibitors. Thus, reaction of (4as,8aR)-4-(3,4-dimethoxyphenyl)-2piperidin-4-yl-4a,5,8,8a-tetrahydro-2H-phthalazin-1-one hydrochloride (preparation given) with naphthalene-1-sulfonyl chloride gave compound II. prepared compds. inhibited PDE4 with  $-\log(IC50) \ge 8.8$ .

IT 666737-18-4P

> RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES

(preparation of piperidinylphthalazinone derivs. as PDE4 inhibitors)

RN666737-18-4 CAPLUS

CN Benzamide, N-[[5-[[4-[(4aS,8aR)-4-(3,4-dimethoxyphenyl)-4a,5,8,8atetrahydro-1-oxo-2(1H)-phthalazinyl]-1-piperidinyl]sulfonyl]-2thienyl]methyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

REFERENCE COUNT:

THERE ARE 13 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

9 ANSWER 13 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2003:855758 CAPLUS

DOCUMENT NUMBER:

139:364829

TITLE:

Preparation of heterocyclo inhibitors of potassium

channel function

INVENTOR(S):

Lloyd, John; Jeon, Yoon T.; Finlay, Heather; Yan, Lin;

Beaudoin, Serge; Gross, Michael F.

PATENT ASSIGNEE(S):

Bristol-Myers Squibb Company, USA; Icagen, Inc.

SOURCE: PCT Int. Appl., 330 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PA	PATENT NO.					D	DATE		APPLICATION NO.						DATE			
	2003088908								WO 2003-US11807						20030416			
	W:	ΑE,	AG,	AL,	.AM,	ΑT,	AU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,	
		CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	GH,	
		GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	ΚZ,	LC,	LK,	LR,	
		LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NI,	NO,	NZ,	OM,	
		PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	TJ,	TM,	TN,	TR,	TT,	
		TZ,	UA,	UG,	US,	UZ,	VC,	VN,	ÝŪ,	ZA,	ZM,	zw						
	RW:	GH,	GM,	ΚE,	LS,	MW,	ΜZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	ΑZ,	BY,	
		KG,	ΚZ,	MD,	RU,	ТJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	
		FI,	FR,	GB,	GR,	HU,	IE,	IT,	LU,	MC,	NL,	PT,	RO,	SE,	SI,	SK,	TR,	
		BF,	ВJ,	CF,	CG,	CI,	CM,	GΑ,	GN,	GΩ,	GW,	ML,	MR,	NE,	SN,	TD,	TG	
US	A1 20040610					US 2003-417355					20030416							
PRIORIT						US 2	002-	3742	79P		P 20	020	419					
OTHER S	MARPAT 139:364829																	
GI																		

$$\begin{bmatrix} R^2 & J - R^3 \\ \downarrow \\ \downarrow \\ p \\ \downarrow \\ m \\ Q & R? & I \end{bmatrix}$$

The title compds. [I; m, p = 0-3 (provided that the sum of m and p is at least 2); Q = NR1, O, S, SO, SO2; R1 = H, C(:W)NR6R7, SO2NR6R7, OCONR6R7, etc.; R2 = heteroaryl, heteroarylalkyl, aryl, etc.; J = a bond, alkylene; R3 = R5, OR5, SO2R5, etc.; R5 = CN, heteroaryl, aryl, etc.; R6, R7 = H, alkyl, OH, etc.; W = (un)substituted NH, N(CO2H), N(CN), N(SO2H), CH(NO2); Rx = H, alkyl, hydroxyalkyl, aryl, etc.], useful as inhibitors of potassium channel function (especially inhibitors of the Kv1 subfamily of voltage gated K+ channels, especially inhibitors Kv1.5 which has been linked to the ultra-rapidly activating delayed rectifier K+ current IKur) in the prevention and treatment of arrhythmia and IKur-associated conditions, were prepared E.g., a multi-step synthesis of II [starting from bis(2-chloroethyl)amine], was given. Pharmaceutical composition comprising the

compound I is claimed.

# IT 619293-23-1P 619293-47-9P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of substituted piperidines as inhibitors of potassium channel function)

RN 619293-23-1 CAPLUS

CN Benzamide, N-[[1-[(4-hydroxy-1-piperidinyl)sulfonyl]-4-phenyl-4-piperidinyl]methyl]-2-methoxy- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} \text{OMe} & \text{O} & \text{OH} \\ \text{O} & \text{N} & \text{S} & \text{N} \\ \text{C} & \text{NH} - \text{CH}_2 & \text{O} \\ \end{array}$$

RN 619293-47-9 CAPLUS

CN Benzamide, N-[[1-[[4-(hydroxymethyl)-1-piperidinyl]sulfonyl]-4-phenyl-4-piperidinyl]methyl]-2-methoxy- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
O & & & \\
O & & & \\
C-NH-CH_2 & & \\
OMe & & Ph
\end{array}$$

$$\begin{array}{c|c}
O & & \\
N-S & \\
N & \\
O &$$

ANSWER 14 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2003:656749 CAPLUS

DOCUMENT NUMBER:

139:197386

TITLE:

Preparation of isoquinolinone derivatives as JNK

INVENTOR(S):

Itoh, Fumio; Kimura, Hiroyuki; Igata, Hideki;

Kawamoto, Tomohiro; Sasaki, Mitsuru; Kitamura, Shuji Takeda Chemical Industries, Ltd., Japan

PATENT ASSIGNEE(S):

PCT Int. Appl., 369 pp.

SOURCE:

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

Japanese

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.						KIND DATE				APPL:	ICAT:	ION 1	DATE					
	WO 2003068750					A1 20030821			1	WO 2	003-	JP14:	20030212						
		W:	AE,	AG,	AL,	AM,	ΑT,	AU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	ΒZ,	CA,	CH,	CN,	
			co,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	GH,	
			GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KR,	KZ,	LC,	LK,	LR,	LS,	
			LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NO,	NZ,	OM,	PH,	PL,	
			PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	ТJ,	TM,	TN,	TR,	TT,	TZ,	UA,	
			UG,	US,	UZ,	VC,	VN,	YU,	ZA,	ZM,	zw								
		RW:	GH,	GM,	KE,	LS,	MW,	ΜZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	ΑZ,	BY,	
			KG,	KZ,	MD,	RU,	TJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,	
			FI,	FR,	GB,	GR,	HU,	ΙE,	IT,	LU,	MC,	NL,	PT,	SE,	SI,	SK,	TR,	BF,	
		,	ВJ,	CF,	CG,	CI,	CM,	GΑ,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG		
	EP 1484320					A1	A1 20041208			]	EP 20	003-	7050	20030212					
		R:	ΑT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	MC,	PT,	
			IE,	SI,	LT,	LV,	FI,	RO,	MK,	CY,	AL,	TR,	BG,	CZ,	EE,	HU,	SK		
*	JP 2004143134					A2		2004	0520	JP 2003-35096					20030213				
PRIOF	PRIORITY APPLN. INFO.:								٠,	·JP 2002-35073					A 20020213				
•							•			JP 2002-251997					7	A 20020829			
										1	WO 20	003-	JP14:	W 20030212					

#### OTHER SOURCE(S): MARPAT 139:197386

Claimed are JNK (c-Jun N-terminal kinase) inhibitors containing isoquinolinones or salts thereof. The second claim specifies that said isoquinolinones are 1-isoquinolinones. Compds. of this invention in vitro showed IC50 values of 0.0067 µM to 0.095 µM against JNK1. Formulations are given.

#### IT 583836-25-3P 583836-40-2P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES

(preparation of isoquinolinone derivs. as JNK inhibitors)

RN 583836-25-3 CAPLUS

CN 4-Piperidinecarboxylic acid, 1-[[4-[(3-acetyl-6-bromo-1-oxo-4-phenyl-2(1H)isoquinolinyl)methyl]phenyl]sulfonyl]-, ethyl ester (9CI) (CA INDEX NAME)

RN 583836-40-2 CAPLUS

CN 4-Piperidinecarboxylic acid, 1-[[4-[(3-acetyl-6-bromo-1-oxo-4-phenyl-2(1H)-isoquinolinyl)methyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Ph} & \text{O} & \text{CO}_2H \\ & & \text{N} & \text{CH}_2 & \text{O} \\ & & \text{O} & \text{O} \end{array}$$

REFERENCE COUNT:

14 THERE ARE 14 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

10/070,954

CAPLUS COPYRIGHT 2004 ACS on STN ANSWER 15 OF 82

ACCESSION NUMBER:

2003:396851 CAPLUS

DOCUMENT NUMBER:

INVENTOR(S):

138:401607

TITLE:

SOURCE:

Preparation of piperidino cannabinoid receptor ligands Friary, Richard J.; Kozlowski, Joseph A.; Shankar, Bandarpalle B.; Wong, Michael K. C.; Zhou, Guowel;

Lavey, Brian J.; Shih, Neng-Yang; Tong, Ling; Chen,

Lei; Shu, Youheng

PATENT ASSIGNEE(S):

Schering Corporation, USA PCT Int. Appl., 148 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent English

LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND DATE	APPLICATION NO.	DATE						
WO 2003042174	A1 20030522	WO 2002-US36185	20021112						
W: AE, AG, AL,	AM, AT, AU, AZ,	BA, BB, BG, BR, BY, BZ	, CA, CH, CN,						
CO, CR, CZ,	DE, DK, DM, DZ,	EC, EE, ES, FI, GB, GD	, GE, HR, HU,						
ID, IL, IN,	IS, JP, KG, KR,	KZ, LC, LK, LR, LT, LU	, LV, MA, MD,						
MG, MK, MN,	MX, MZ, NO, NZ,	PH, PL, PT, RO, RU, SC	, SE, SG, SI,						
SK, SL, TJ,	TM, TN, TR, TT,	TZ, UA, UZ, VC, VN, YU	, ZA, ZM						
RW: GH, GM, KE,	LS, MW, MZ, SD,	SL, SZ, TZ, UG, ZM, ZW	, AM, AZ, BY,						
KG, KZ, MD,	RU, TJ, TM, AT,	BE, BG, CH, CY, CZ, DE	, DK, EE, ES,						
FI, FR, GB,	GR, IE, IT, LU,	MC, NL, PT, SE, SK, TR	, BF, BJ, CF,						
CG, CI, CM,	GA, GN, GQ, GW,	ML, MR, NE, SN, TD, TG							
US 2004010013	A1 20040115	US 2002-292778	20021112						
EP 1444203	A1 20040811	EP 2002-784433	20021112						
R: AT, BE, CH,	DE, DK, ES, FR,	GB, GR, IT, LI, LU, NL	, SE, MC, PT,						
		CY, AL, TR, BG, CZ, EE							
BR 2002014164	A 20040928	BR 2002-14164	20021112						
PRIORITY APPLN. INFO.:		US 2001-332911P	P 20011114						
		WO 2002-US36185	W 20021112						
OTHER SOURCE(S):	MARPAT 138:4016	07							

GΙ

Title compds. I [L1 = bond, CH2, CO, CO2, SO2, etc.; L2 = CH2, CH(alkyl), C(alkyl)2, etc.; L3 = bond, CO, SO2; R1 = H, halo, alkyl, haloalkyl, cycloalkyl, etc.; R2 = H, OH, halo, CF3, alkoxy, etc.; R3-4 = H, alkyl, taken together form a carbonyl group; R5 = H, alkyl; R6 = H, alkyl, haloalkyl, cycloalkyl, amino, etc.; n = 0-3] are prepared For instance, 4-(trifluoroacetamidomethyl)piperidine TFA salt is reacted with p-chlorobenzenesulfonyl chloride (CH2Cl2, Et3N), the resulting sulfonamide functionalized ortho to the sulfonyl group (THF, n-BuLi, Boc2O), the trifluoroacetyl group removed (MeOH, K2CO3) and the amine refunctionalized with trifluoromethanesulfonic anhydride to give II. Compds. of the invention are found to exhibit cannabinoid CB2 receptor binding activity in the range of 0.1 to 1000 nM and possess anti-inflammatory and immunomodulatory activity.

II

## IT 530114-86-4P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of substituted piperidino cannabinoid receptor ligands for treatment of inflammatory disorders)

RN 530114-86-4 CAPLUS

CN Cyclopentanecarboxamide, N-[2-[[4-[[(methylsulfonyl)amino]methyl]-1-piperidinyl]sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

2

REFERENCE COUNT:

THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

N. 39 ANSWER 16 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

138:368620

ACCESSION NUMBER:

2003:335065 CAPLUS

DOCUMENT NUMBER: TITLE:

Preparation of 2-chloro-5-nitrobenzamides as lipid modulators for treatment of osteoporosis and diabetes

INVENTOR(S): Amemiya, Yo

Amemiya, Yoshiya; Wakabayashi, Kenji; Takaishi,

Sachiko; Kitayama, Ken

PATENT ASSIGNEE(S):

Sankyo Company, Limited, Japan

SOURCE:

PCT Int. Appl., 221 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

I

LANGUAGE:

Japanese

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT	NO.			KIND DATE					APPL	ICAT	ION 1	.OV		DATE .		
						_											
	WO 2003	A1 20030501				WO 2	002-	JP11	068		21	0021	024				
	W: AE, AG, AL,				AM;	ΑT,	ΑU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,
		co,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	GH,
		GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	ΚE,	KG,	KP,	KR,	KZ,	LC,	LK,	LR,
		LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NO,	NZ,	OM,	PH,
	PL, PT, RO,				RU,	SD,	SE,	SG,	SI,	SK,	SL,	ТJ,	TM,	TN,	TR,	TT,	TZ,
	UA, UG, US,				ÜΖ,	VC,	VN,	YU,	ZA,	ZM,	zw						
	RW:	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	AM,	AZ,	BY,
		KG,	ΚZ,	MD,	RU,	ТJ,	TM,	AT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,	EE,	ES,
		FI,	FR,	GB,	GR,	IE,	IT,	LU,	MC,	NL,	PT,	SE,	SK,	TR,	BF,	ВJ,	CF,
		CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG			
	JP 2003201271						2003	0718		JP 2	002-	3105	49		2	0021	025
PRIORITY APPLN. INFO.:										JP 2	001-	3271	89	i	A 20	0011	025
OTHER	SOURCE	MARPAT 138:368620															
GI											•						

$$\begin{array}{c|c}
C1 & R & \\
N & A & (X \\
D) & n
\end{array}$$

AB The title compds. I [wherein A = (un) substituted Ph, naphthyl, acenaphthenyl, Py, (iso) quinolyl, pyrimidyl, (benzo) furyl, pyranyl, chromanyl, (benzo) thienyl, pyrrolyl, (iso) indolyl, imidazolyl, pyrazolyl, pyridazinyl, pyrazinyl, (iso) oxazolyl, pyrrolidinyl, piperidyl, piperazyl, benzoxazolyl, benzoisooxazolyl, (iso) thiazolyl, benzothiazolyl, or biphenyl; B = (un) substituted aryl, cycloalkyl, or heterocyclyl; R = H or alkyl; X = a bond, O, S, CH2, CO, NH, SO2NH, NHSO2, CONH, NHCO, or OCH2; n = 0-1] and pharmaceutically acceptable salts thereof are prepared as lipid modulators for treatment of osteoporosis and diabetes. For example, 4-phenylaniline hydrochloride was reacted with 2-chloro-5-nitrobenzoyl chloride in pyridine to afford N-(4-phenylphenyl)-2-chloro-5-nitrobenzamide showed IC50 of 1.9 nM against human PPAR γ. I are useful for the treatment of osteoporosis, and diabetes, etc.

IT 372095-22-2P

CN

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(drug candidate; preparation of chloro(nitro)benzamides as lipid modulators for treatment of osteoporosis and diabetes)

RN 372095-22-2 CAPLUS

Benzamide, 2-chloro-5-nitro-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

REFERENCE COUNT:

27 THERE ARE 27 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

CAPLUS COPYRIGHT 2004 ACS on STN ANSWER 17 OF 82

ACCESSION NUMBER:

2003:22851 CAPLUS

DOCUMENT NUMBER:

138:55878

TITLE:

Preparation of bispiperidines as antibacterial agents

and inhibitors of phosphopantetheine adenylyl

INVENTOR(S):

Lampe, Thomas; Ehlert, Kerstin; Freiberg, Christoph;

Schiffer, Guido

PATENT ASSIGNEE(S):

Bayer Aktiengesellschaft, Germany

SOURCE:

PCT Int. Appl., 86 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

German

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO. DATE APPLICATION NO. KIND DATE \_\_\_\_\_\_\_ WO 2003002534 20030109 WO 2002-EP6640 Α1 20020617 W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG DE 10138234 20030109 DE 2001-10138234 **A**1 20010803 PRIORITY APPLN. INFO.: DE 2001-10131134 20010628 Α DE 2001-10138234 A 20010803

OTHER SOURCE(S):

MARPAT 138:55878

$$R^{1}$$
  $SO_{2}$   $R^{2}$   $R^{3}$ 

AΒ Use of title compds. [I; A = O, (CH2)n; n = 0-2; R1-R3 = H, halo, alkyl, cycloalkyl, alkoxy, alkoxycarbonyl, etc.; or R1R2 = C6 aryl, 5-8 membered heterocyclyl; R3 = H, halo, alkyl, cycloalkyl, alkoxy, alkoxycarbonyl, alkylcarbonyl, amino, etc.; R4 = H, alkyl, cycloalkyl, alkylcarbonyl, cycloalkylcarbonyl, arylcarbonyl, etc.], for treatment of bacterial infection is claimed. I are useful for the treatment of diseases caused by bacteria requiring phosphopantetheine adenylyl transferase (CoaD) enzyme for CoA synthesis. Tested I (general preparation given) inhibited CoaD

T

activity with IC50 = 0.65-12.5  $\mu M,$  and showed min. inhibitory concns. of <0.2  $\mu M$  to 100  $\mu M$  against B. subtilis Al 796.

IT 479618-78-5P 479619-24-4P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of bispiperidines as antibacterial agents and inhibitors of phosphopantetheine adenylyl transferase)

RN 479618-78-5 CAPLUS

CN 4-Morpholinecarboxamide, N-[3-chloro-4-[[4-[2-(4-piperidinyl)ethyl]-1-piperidinyl]sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & & \\ & & & \\ & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\$$

RN 479619-24-4 CAPLUS

CN 4-Morpholinecarboxamide, N,N'-[1,3-propanediylbis(4,1-piperidinediylsulfonyl-4,1-phenylene)]bis-(9CI) (CA INDEX NAME)

PAGE 1-A

PAGE 1-B

$$-NH-C-N$$

REFERENCE COUNT:

4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

ANSWER 18 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2003:5775 CAPLUS

DOCUMENT NUMBER:

138:89797

TITLE:

Preparation of substituted oxazolidinones for combinational therapy in the treatment and/or

prophylaxis of thromboembolic diseases

INVENTOR(S):

Straub, Alexander; Lampe, Thomas; Pernerstorfer,

Josef; Perzborn, Elisabeth; Pohlmann, Jens; Roehrig,

Susanne; Schlemmer, Karl-Heinz

PATENT ASSIGNEE(S):

Bayer Aktiengesellschaft, Germany

SOURCE:

PCT Int. Appl., 161 pp.

SOURCE.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

German

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

					KIND DATE													
											WO 2002-EP6237 2002							
WO	2003	0002	56		C2 20030206													
	W:	ΑE,	AG,	AL,	AM,	AT,	AU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,	
							DK,											
		GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG.	KP.	KR.	KZ,	LC.	LK.	LR.	
							MD,						•		-			
			•				SE,					•	•	•	•	•	•	
	UA, UG, US, UZ, VN, YU, ZA TJ, TM									,	•	,		,		,	•	
	RW: GH, GM, KE, LS, MW, MZ								SL,	SZ,	TZ,	UG,	ZM,	ZW,	AT,	BE.	CH,	
	CY, DE, DK, ES, FI, FR, GB BF, BJ, CF, CG, CI, CM, GA								-	-	-			•				
DE	1012																	
	2004																	
									EP 2002-738154 20020607									
							ES,											
				-	-		RO,	_		-	-	,	,	,	,	,	,	
BR	2002		•	•		•	2004	•		•		1094	1		2	0020	607	
	2004																	
	2004																	
PRIORIT													9725					
													37					
OTHER SO	OURCE	(S):			MAR	PAT	138:	8979		•				·				

## \* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT \*

AB The invention relates to combinations of (A) oxazolidinones I [R1 = 5-X-2-thienyl (X = Cl, Br, Me, CF3); R2 = DA; A = phenylene; D = 5- or 6-membered heterocyclic ring containing S, N or O; R4 - R8 = H], or their pharmaceutically acceptable salts, hydrates, prodrugs or their mixts. and (B) other pharmaceutically active ingredients; to a method for producing said combinations; and to the use thereof as medicaments, in particular for the treatment and/or prophylaxis of thrombo-embolic diseases. Thus, the claimed oxazolone II was prepared from epoxide III via epoxide ring opening with aniline derivative IV, cyclization with carbonyldiimidazole, and

N-acylation with 5-chlorothiophene-2-sulfonyl chloride. II was tested for antithrombotic activity in the arteriovenous shunt model (Rat) after [ED50 = 3 mg/kg (p.o.); IC50 = 0.7 nM]; II had a synergistic effect when used in combination with clopidogrel.

IT 482307-07-3P 482307-08-4P

RL: SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation and pharmacol. activity of; preparation of substituted oxazolidinones for combinational therapy in the treatment and/or prophylaxis of thromboembolic diseases)

RN 482307-07-3 CAPLUS

CN 2-Thiophenecarboxamide, 5-chloro-N-[[2-oxo-3-[4-(1-piperidinylsulfonyl)phenyl]-5-oxazolidinyl]methyl]- (9CI) (CA INDEX NAME)

RN 482307-08-4 CAPLUS

CN 2-Thiophenecarboxamide, 5-chloro-N-[[3-[4-[(4-hydroxy-1-piperidinyl)sulfonyl]phenyl]-2-oxo-5-oxazolidinyl]methyl]- (9CI) (CA INDEX NAME)

C1 
$$C - NH - CH_2$$
  $O - NH - CH_2$   $O - NH$   $O -$ 

REFERENCE COUNT:

THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

539 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2002:832756 CAPLUS

DOCUMENT NUMBER: TITLE:

Preparation of pyrrole derivatives having antidiabetic

activity

137:337775

INVENTOR(S):

Nagata, Ryu; Maruta, Katsunori; Iwai, Kiyotaka; Kitoh,

Makoto; Ushiroda, Kantaro; Yoshida, Kozo

PATENT ASSIGNEE(S):

Sumitomo Pharmaceuticals Company, Limited, Japan

PCT Int. Appl., 248 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

SOURCE:

Japanese

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.							DATE		APPL	ICAT	ION	NO.	DATE						
	WO 2002085851					A1 20021031				1	WO 2	 002-	 JP37	90		2	0020	417		
	W: AE, AG, AL,					AM,	ΑT,	AU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,		
			CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	GH,		
			GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KR,	KZ,	LC,	LK,	LR,	LS,		
			LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NO,	NZ,	OM,	PH,	PL,		
						SD,														
						VN,													TM	
		RW:	GH,	GM,	KE,	LS,	MW,	ΜZ,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	ΑT,	BE,	CH,	,	
			CY,	DE,	DK,	ES,	FI,	FR,	GB,	GR,	ΙE,	IT,	LU,	MC,	NL,	PT,	SE,	TR,		
						CG,														
	EP										EP 2002-720442					20020417				
		R:				DE,										SE,	MC,	PT,		
						LV,														
		<b>A</b> 1	:	2004	0819							20031016								
PRIOR	PRIORITY APPLN. INFO.:											JP 2001-120887					A 20010419			
										I	WO 2002-JP3790						0020	417		
OTHER	R SC	DURCE	(S):			MARI	PAT 1	137:	3377	75										

OTHER SOURCE(S):

MARPAT 137:337775

GΙ

$$R^{5}$$
 $R^{5}$ 
 $R^{2}$ 
 $R^{2}$ 
 $Q=-W^{11}-X^{11}$ 
 $Z=Z^{1}$ 
 $Z=Z^{1}$ 
 $Z=Z^{2}$ 
 $Z=Z^{1}$ 
 $Z=Z^{2}$ 

Q1= 
$$-W13-X13$$
 Z6  $R^8$   $(R^{10})_n$ 

AΒ Novel pyrrole derivs. represented by the following formula (I) and salts thereof [R1 = Q, W12-X12-Ar1, Q1, etc. {wherein X11 = a single bond, O, S; W11 = each (un)substituted C2-5 alkylene, alkenylene, or alkynylene; one of Z1 and Z2 = a C atom substituted by X1-Y1-COR6 (wherein X1 = a single bond, O, S; Y1 = each (un) substituted C1-4 alkylene, C2-5 alkenylene, or C2-5 alkynylene; R6 = HO, each (un)substituted C1-4 alkoxy, C1-4 alkylsulfonylamino, or phenylsulfonylamino) and the other = H, HO, halo, cyano, CONH2, C2-5 alkylaminocarbonyl, etc.; Z3, Z4, Z5 = (un)substituted CH; Ar1 = substituted naphthyl; X12 = a single bond, O, S; W12 = (un) substituted C1-4 alkylene; X13 = a single bond, O, S; W13 = (un) substituted C1-4 alkylene; one of R8 and R9 = X3-Y3-COR11 (wherein X3 = a single bond, O, S; Y3 = (un)substituted C1-4 alkylene, C2-5 alkenylene, or C2-5 alkynylene; R11 = HO, (un)substituted C1-4 alkoxy, C1-4 alkylsulfonylamino, or phenylsulfonylamino) and the other = H, HO, (un) substituted C1-4 alkyl, C2-5 alkenyl, C2-5 alkynyl, C1-4 alkoxy, etc.); one of R2 and R3 = W21-A21 (wherein W21 = (un)substituted C1-6 alkylene, (un) substituted alkenylene, CONH, or CONHCH2; A21 = (un) substituted C6-12 aryl or mono- or dicyclic unsatd. heterocyclyl containing same or different 1-3 heteroatoms selected from N, O, and S) and the other = H, (un) substituted C1-4 alkyl, halo; R4, R5 = H, (un) substituted C1-4 alkyl, halo] are prepared These compds. improve insulin resistance and high blood sugar, have antidiabetic activity, and safely control blood sugar. Thus, a solution of 240 mg 2-(4methylbenzoyl)pyrrole (preparation given) in 2.0 mL THF was added to a solution of

160 mg potassium tert-butoxide in THF 3.0 mL, stirred at room temperature for  $20\,$ 

min, and ice-cooled followed by adding a solution of 370 mg Me [3-[(1E)-3-bromo-1-propenyl]phenoxy]acetate in 4.0 mL THF, and the resulting mixture was stirred at room temperature for 1.5 h to give 31% Me [3-[(1E)-3-[2-(4-methylbenzoyl)-1H-pyrrol-1-yl]-1-propenyl]phenoxy]acetate (II). A solution of II in 1 N aqueous LiOH 1.0, THF 1.0, and MeOH 1.0 mL was stirred at room temperature for 30 min, treated with dilute aqueous HCl, and extracted

with EtOAc to give 100% [3-[(1E)-3-[2-(4-methylbenzoyl)-1H-pyrrol-1-yl]-1-propenyl]phenoxy]acetic acid (III). When male db/db mice were fed with a feed containing 0.1% III for 2 wk, the blood sugar was lowered by 70%.

IT 474008-67-8P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of pyrrole derivs. as antidiabetics for improving insulin resistance and lowering blood sugar)

RN 474008-67-8 CAPLUS

CN Acetic acid, [3-[(1E)-3-[2-[[[4-(1-piperidinylsulfonyl)phenyl]amino]carbon yl]-1H-pyrrol-1-yl]-1-propenyl]phenoxy]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

5

REFERENCE COUNT:

THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

ANSWER 20 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

CESSION NUMBER: 2002:637683 CAPLUS

DOCUMENT NUMBER: 137:185504

TITLE: Preparation of thieno[2,3-d]pyrimidindiones as matrix

metalloproteinase inhibitors for treatment of cancer,

rheumatoid arthritis, and osteoarthritis

INVENTOR(S): Harter, William Glen; Li, Jie Jack; Ortwine, Daniel

Fred; Shuler, Kevon Ray; Yue, Wen-song

PATENT ASSIGNEE(S): Warner-Lambert Company, USA

SOURCE: PCT Int. Appl., 278 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PA'	TENT 1	ΝΟ.			KIND DATE				APPL	ICAT		DATE					
WO	2002	0645	98		<b>A</b> 1		2002	0822		WO 2	002-	IB20	4		2	0020	118
	W:	ΑE,	AG,	AL, AM, AT, AU, AZ, I				BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,	
		CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	GH,
		GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	ΚE,	KG,	ΚP,	KR,	KZ,	LC,	LK,	LR,
		LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NO,	NZ,	OM,	PH,
		PL,	PT,	RO,	RU,	SD,	SE,	SG,	SI,	SK,	SL,	TJ,	TM,	TN,	TR,	TT,	TZ,
		UA,	UG,	US,	UZ,	VN,	YU,	ZA,	ZM,	ZW,	AM,	AZ,	BY,	KG,	KZ,	MD,	RU,
		ТJ,	TM														
	RW: GH, GM, KE, LS, MW, MZ, SD,					SL,	SZ,	TZ,	UG,	ZM,	ZW,	AT,	BE,	CH,			
,		CY,	DE,	DK,	ES,	, FI, FR, GB,				ΙE,	IT,	LU,	MC,	NL,	PT,	SE,	TR,
	BF, BJ, CF, CG,					CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG
CA	2433	778			AA		2002	0822		CA 2	002-	2433'	778		2	0020	118
EP	1370	562			A1 20031217			EP 2002-711123					20020118			118	
	R:	ΑT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	MC,	PT,
		IE,	SI,	LT,	LV,	FI,	RO,	MK,	CY,	AL,	TR						
BR	2002	0072	16		Α		2004	0309		BR 2	002-	7216			2	0020	118
JP	2004	5187	32		Т2		2004	0624		JP 2	002-	5645	29		2	0020	118
US	US 2003004172						2003	0102		US 2	002-	7507	3	20020213			213
PRIORIT	IORITY APPLN. INFO.:									US 2	001-	2687	56P	,	P 20010214		
										WO 2	002-	IB20	4	1	W 2	0020	118
OTHER SO	HER SOURCE(S):					PAT	137:	18550	04								

Title fused pyrimidinones I [wherein C2W = 5-membered (hetero)cyclic AB

diradical substituted with ABR3 and optionally substituted with R2; A = CO or SOO-2; B = O or NR5; or AB = C.tplbond.C; R1, R4, and R5 = independently H, alkyl, alkenyl, alkynyl, (CH2)n-(hetero)aryl, (CH2)n-cycloalkyl, (CH2)n-heterocyclyl, or alkanoyl; R2 and R3 = independently H, alkyl, alkenyl, alkynyl CN, NO2, NR4R5, (CH2)n-cycloalkyl, or (CH2)n-(hetero)aryl; or R2 = halo; n = 0-5; or NR4R5 = (un)substituted heterocyclyl; with the proviso that R1 and R3 ≠ both H or alkyl; or pharmaceutically acceptable salts thereof] were prepared as matrix metalloproteinase (MMP) inhibitors, especially as selective MMP-13 inhibitors. For example, 3-benzyl-6-chloro-1H-pyrimidine-2,4-dione was coupled with mercaptoacetic acid Et ester using Na2CO3 in EtOH (67%) and the product cyclized with POC13 in anhydrous DMF to give 3-benzyl-2,4-dioxo-1,2,3,4-tetrahydrothieno[2,3-d]pyrimidine-6-carboxylic acid Et ester (95%). Saponification (96%) followed by esterification with benzyl alc. and 1-cyclohexyl-3-(2-morpholinoethyl)carbodiimide metho-p-toluenesulfonate afforded II (12%). The latter selectively inhibited the hydrolytic activity of MMP-13 (0.61  $\mu$ M) over MMP-1 (100  $\mu$ M), MMP-2 (100  $\mu$ M), MMP-3 (18  $\mu$ M), MMP-7 (100  $\mu$ M), MMP-9 (100  $\mu$ M), MMP-12 (100  $\mu M)$ , and MMP-14 (100  $\mu M)$  with the indicated IC50 values. I are useful for the treatment of diseases mediated by the MMP-13 enzyme, such as cancer, rheumatoid arthritis, or osteoarthritis (no data). Formulations of I are also disclosed.

## IT 448965-29-5P

CN

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(MMP inhibitor; preparation of thienopyrimidinediones as MMP inhibitors for treatment of cancer, rheumatoid arthritis, and osteoarthritis)

RN 448965-29-5 CAPLUS

Thieno[2,3-d]pyrimidine-6-carboxamide, 1,2,3,4-tetrahydro-N-[(3-methoxyphenyl)methyl]-1-methyl-3-[[4-[(4-methyl-1-piperidinyl)sulfonyl]phenyl]methyl]-2,4-dioxo- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
 & O \\
 & N \\
 & S \\
 & O \\
 & C \\
 & O \\$$

REFERENCE COUNT:

3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

10/070,954

39 ANSWER 21 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2002:349146 CAPLUS

DOCUMENT NUMBER:

136:369608

TITLE:

Preparation of 3-(N'-oxodihydropyridinylureido)-3-

phenylpropanoates as inhibitors of  $\alpha 4\beta 1$ 

integrin binding

CODEN: EPXXDW

INVENTOR(S):

Biediger, Ronald J.; Chen, Qi; Holland, George W.; Kassir, Jamal M.; Li, Wen; Market, Robert V.; Scott,

Ian L.; Wu, Chengde; Decker, Radford E.; Li, Jian

PATENT ASSIGNEE(S):

Texas Biotechnology Corporation, USA

SOURCE:

Eur. Pat. Appl., 131 pp.

DOCUMENT TYPE: LANGUAGE:

Patent English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE				
EP 1203766	A2	20020508	EP 2001-125494	20011106				
EP 1203766	<b>A</b> 3	20041208		•				
R: AT, BE, CH,	DE, DK	, ES, FR, G	B, GR, IT, LI, LU, N	L, SE, MC, PT,				
IE, SI, LT,	LV, FI	, RO, MK, C	Y, AL, TR					
US 2004063955	<b>A</b> 1	20040401	20011009					
ZA 2001008777	A	20030124	ZA 2001-8777	20011024				
PRIORITY APPLN. INFO.:			US 2000-707068	A 20001106				
			US 2001-973142	A 20011009				
			US 1999-132971P	P 19990507				
			US 2000-565920	A2 20000505				

OTHER SOURCE(S): MARPAT 136:369608

AB Title compds. were prepared Thus, 2-ClC6H4CH2ZNH2 (Z = 4-ethyl-2-oxo-1,2-dihydropyridine-1,3-diyl)(preparation given) was condensed with (S)-4-MeC6H4CH(NH2)CH2CO2Et and COCl2 to give, after saponification, (S)-2-ClC6H4CH2ZNHCONHCH(C6H4Me-4)CH2CO2H (Z as above). Data for biol. activity of title compds. were given.

IT 422516-68-5P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of 3-(N'-oxodihydropyridinylureido)-3-phenylpropanoates as inhibitors of  $\alpha 4\beta 1$  integrin binding)

RN 422516-68-5 CAPLUS

CN Benzenepropanoic acid,  $\beta$ -[[[1-[[2-chloro-5-(1-piperidinylsulfonyl)phenyl]methyl]-1,2-dihydro-4-hydroxy-5-methyl-2-oxo-3-pyridinyl]amino]carbonyl]amino]-4-methyl-, ( $\beta$ S)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Me

c]pyridin-5(4H)-yl)methyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & &$$

L39 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2002:253021 CAPLUS

DOCUMENT NUMBER: 136:279348

TITLE: Preparation of pharmaceutically active sulfonamides

bearing both lipophilic and ionizable moieties as

inhibitors of protein Jun kinases

INVENTOR(S): Halazy, Serge; Church, Dennis; Camps, Montserrat;

Rueckle, Thomas; Gotteland, Jean Pierre; Biamonte,

Marco; Arkinstall, Stephen

PATENT ASSIGNEE(S): Applied Research Systems ARS Holding N.V., Neth.

Antilles

SOURCE: Eur. Pat. Appl., 44 pp.

CODEN: EPXXDW

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.										APF	LICA		DATE				
	EP	1193	268															
													, LI,				MC,	PT,
						LV,				-		•		·		•	•	•
	CA	2421	209			AA		2002	0404		CA	2001	-2421	209		2	0010	927
	WO	2002	0267	33 .		A2		20020404 WO 2001-IB1772										
		2002						2002										
		W:	Æ,	AG,	AL,	AM,	AT,	AU,	AZ,	BA,	BB	, BG	, BR,	BY,	BZ,	CA,	CH,	CN,
													, ES,					
													, KP,					
													, MX,					
													, TM,					
													, KZ,					•
		RW:	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ	, TZ	, UG,	ZW,	AT,	BE,	CH,	CY,
													, MC,					
			ВJ,	CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW	, ML	, MR,	NE,	SN,	TD,	TG	
	AU	2001											-8799				0010	927
	BR	2001	0142	23		A							-1422				0010	927
	EP	1322	642			A2		2003	0702		EΡ	2001	-9676	22		2	0010	927
		R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR	, IT	, LI,	LU,	NL,	SE,	MC,	PT,
								RO,									•	•
	ZA	2003	0017	46		Α		2004	0303		ZA	2003	-1746			2	0010	927
		2004						2004	0402		JP	2002	-5311	17		2	0010	927
,	NZ	5245	42			Α		2004	0924		NZ	2001	-5245	42		2	0010	927
	BG	1076	33			Α		2003	1128		BG	2003	-1076	33		2	0030	313
	NO	2003	0013	75		Α		2003	0326		ОИ	2003	-1375			2	0030	326
	US	2004	0778	54		<b>A</b> 1		2004	0422		US	2003	-3816	65		2	0031	010
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OTHER SOURCE(S):

MARPAT 136:279348

GΙ

$$MeO \longrightarrow \begin{matrix} H & & O \\ I & & S = O \\ N & & & \\ N &$$

AB The title compds. ArlC(:X)NR1(CH2)nAr2SO2Y [I; Arl, Ar2 = (un)substituted aryl, heteroaryl; X = 0, S, preferably O; R1 = H, alkyl, or R1 forms (un)substituted 5-6 membered (un)saturated ring with Arl; n = 0-5, preferably between 1-3 and most preferred 1; Y = (un)substituted 4-12 membered saturated cyclic or bicyclic alkyl which is substituted with at least one ionizable moiety to which a lipophilic chain is attached and which is containing at least one N atom, whereby one N atom within said ring is forming a bond with the sulfonyl group thus providing a sulfonamide] which are efficient modulators of the JNK pathway, in particular efficient and selective inhibitors of JNK 2 and 3, were prepared and formulated. E.g., a multi-step synthesis of II which showed IC50 of 0.04 µM against JNK3, was given.

IT 406487-03-4P 406677-95-0P 406677-96-1P

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406487-03-4P 406677-95-0P 406677-96-1P
406677-98-3P 406677-99-4P 406678-00-0P
406678-01-1P 406678-02-2P 406678-03-3P
406678-04-4P 406678-05-5P 406678-06-6P
406678-07-7P 406678-08-8P 406678-09-9P
406678-10-2P 406678-11-3P 406678-12-4P
406678-13-5P 406678-14-6P 406678-15-7P
406678-16-8P 406678-17-9P 406678-18-0P
406678-19-1P 406678-20-4P 406678-22-6P
406678-23-7P 406678-24-8P 406678-25-9P
406678-26-0P 406678-27-1P 406678-28-2P
406678-29-3P 406678-30-6P 406678-31-7P
406678-32-8P 406678-33-9P 406678-34-0P
406678-35-1P 406678-36-2P 406678-37-3P
406678-38-4P 406678-39-5P 406678-40-8P
406678-41-9P 406678-42-0P 406678-43-1P
406678-44-2P 406678-45-3P 406678-46-4P
406678-47-5P 406678-48-6P 406678-49-7P
406678-50-0P 406678-51-1P 406678-52-2P
406678-53-3P 406678-55-5P 406678-57-7P
406678-58-8P 406678-59-9P 406678-60-2P
406678-61-3P 406678-62-4P 406678-63-5P
406678-64-6P 406678-92-0P 406678-93-1P
406678-94-2P 406678-95-3P 406678-96-4P
406678-97-5P 406678-98-6P 406678-99-7P
406679-00-3P 406679-01-4P 406679-30-9P
406679-44-5P
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RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of pharmaceutically active sulfonamides bearing both lipophilic and ionizable moieties as inhibitors of protein Jun kinases) 406487-03-4 CAPLUS

3-Thiophenecarboxylic acid, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-(octylamino)-1-piperidinyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN

RN 406677-95-0 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[[4-(trifluoromethyl)phenyl]methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & &$$

RN 406677-96-1 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[[(3-chlorophenyl)methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

C1 
$$C-NH-CH_2$$
  $S$   $NH-CH_2$   $C1$ 

RN 406677-98-3 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[[4-[(trifluoromethyl)thio]phenyl]methyl]a mino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & & & \\ & & & & \\ & & & & \\ & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & &$$

RN 406677-99-4 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[(4-phenoxyphenyl)methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & & & \\ & & & & & \\ & & & & \\ & & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & &$$

RN 406678-00-0 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[[4-[(trifluoromethyl)sulfonyl]phenyl]meth yl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} O \\ S \\ C \\ NH \\ CH_2 \\ \hline \end{array}$$

RN 406678-01-1 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[(3-methylphenyl)methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-02-2 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[(4-propylphenyl)methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & &$$

RN 406678-03-3 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[[3-(trifluoromethyl)phenyl]methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & & & & \\ & & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & \\ & & \\ & \\ & & \\$$

RN 406678-04-4 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[[4-(trifluoromethoxy)phenyl]methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-05-5 CAPLUS

CN Benzamide, N-[[5-[[4-[[[4-(difluoromethoxy)phenyl]methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

PAGE 1-A

O

$$C-NH-CH_2$$
 $S$ 
 $NH-CH_2$ 
 $NH-CH_2$ 

PAGE 1-B

- CHF<sub>2</sub>

RN 406678-06-6 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[(pentamethylphenyl)methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-07-7 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[(4-propoxyphenyl)methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-08-8 CAPLUS

CN Benzamide, N-[[5-[[4-[[(4-butoxyphenyl)methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

RN 406678-09-9 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[(4-methoxyphenyl)methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} O & O & O \\ \hline O & O & NH-CH_2 \\ \hline O & O & O \\$$

RN 406678-10-2 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(4-pyridinylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
 & O \\
 & O \\
 & C - NH - CH_2 \\
 & O \\
 & O \\
 & O \\
 & O \\
 & NH - CH_2 \\
 & O \\$$

RN 406678-11-3 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(2-pyridinylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-12-4 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(3-pyridinylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & &$$

RN 406678-13-5 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(4-quinolinylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

PAGE 2-A

RN 406678-14-6 CAPLUS

CN Benzamide, N-[[5-[[4-[[[4-(1,1-dimethylethyl)phenyl]methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & &$$

RN 406678-15-7 CAPLUS

CN Benzamide, N-[[5-[[4-[[(3-ethoxyphenyl)methyl]amino]-1-

piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S$   $NH-CH_2$   $OEt$ 

RN 406678-16-8 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(hexylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-17-9 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(heptylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-18-0 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(pentylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

C1 O NH- 
$$(CH_2)_4$$
-Me  $S$  N NH-  $(CH_2)_4$ -Me

RN 406678-19-1 CAPLUS

CN Benzamide, N-[[5-[[4-(butylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-4-chloro- (9CI) (CA INDEX NAME)

C1 
$$O$$
  $NHBu-n$   $C-NH-CH_2$   $S$   $S$   $N$   $NHBu-n$   $O$ 

RN 406678-20-4 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(dodecylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-22-6 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[(2-cyclohexylethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-23-7 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[(cyclohexylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-24-8 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[[(1R)-1-cyclohexylethyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 406678-25-9 CAPLUS

CN Benzamide, N-[[5-[[4-[(1R,2R,4S)-bicyclo[2.2.1]hept-2-ylamino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-4-chloro- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 406678-26-0 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[(2-propoxyethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} \text{Cl} & \text{O} & \text{NH-CH}_2-\text{CH}_2-\text{OPr-n} \\ \hline \\ \text{C-NH-CH}_2 & \text{S-N} & \text{N} \\ \hline \\ \text{O} & \text{O} \end{array}$$

RN 406678-27-1 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[(tricyclo[3.3.1.13,7]dec-1-ylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & & & \\ & & & & \\ & & \\ & & & \\ & & \\ & & \\ & & & \\ & & \\ & & & \\ & & \\ & & & \\ & & \\ & & & \\ & & \\ & &$$

RN 406678-28-2 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[[2-(2-pyridinyl)ethyl]amino]-1-

piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-29-3 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[[2-(1-piperidinyl)ethyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-30-6 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[(2-ethylhexyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-31-7 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(octylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-32-8 CAPLUS

CN Benzamide, N-[[5-[[4-(heptylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

RN 406678-33-9 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-(octylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-34-0 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-(pentylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S$   $NH-(CH_2)_4-Me$ 

RN 406678-35-1 CAPLUS

CN Benzamide, N-[[5-[[4-(butylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S$   $NHBu-n$   $NHBu-n$ 

RN 406678-36-2 CAPLUS

CN Benzamide, N-[[5-[[4-(dodecylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

RN 406678-37-3 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-(nonylamino)-1-piperidinyl]sulfonyl]-2-

thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-38-4 CAPLUS

CN Benzamide, N-[[5-[[4-(decylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

RN 406678-39-5 CAPLUS

CN Benzamide, N-[[5-[[4-(ethylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

RN 406678-40-8 CAPLUS

CN Benzamide, N-[[5-[[4-[(2-cyclohexylethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & & & \\ & & & & & \\ & & & & \\ & & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & &$$

RN 406678-41-9 CAPLUS

CN Benzamide, N-[[5-[[4-[[(1R)-1-cyclohexylethyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 406678-42-0 CAPLUS

CN Benzamide, N-[[5-[[4-[(1R,2R,4S)-bicyclo[2.2.1]hept-2-ylamino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 406678-43-1 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(2-propoxyethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} O & O & NH-CH_2-CH_2-OPr-n \\ \hline \\ MeO & S & N \\ \hline \\ O & O \end{array}$$

RN 406678-44-2 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(tricyclo[3.3.1.13,7]dec-1-ylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

MeO 
$$\parallel$$
  $C-NH-CH_2$   $\parallel$   $S$   $\parallel$   $NH-CH_2$ 

RN 406678-45-3 CAPLUS

CN Benzamide, N-[[5-[[4-[(3,3-diethoxypropyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} \text{OEt} \\ \text{O} \\ \text{NH-CH}_2-\text{CH}_2-\text{CH-OEt} \\ \\ \text{MeO} \end{array}$$

RN 406678-46-4 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[3-(4-morpholinyl)propyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-47-5 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[2-(2-pyridinyl)ethyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \circ & \circ & \circ & \circ \\ & \parallel & \circ & \circ & \circ \\ & C-NH-CH_2 & & S-N & \circ \\ & \parallel & \circ & \circ \\ & O & & \circ & \circ \\ & O & & \bullet & \circ \\ \end{array}$$

RN 406678-48-6 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[2-(1-piperidinyl)ethyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} O & O & O \\ \parallel & NH-CH_2-CH_2-CH_2-N \\ \hline \\ MeO & O \end{array}$$

RN 406678-49-7 CAPLUS

CN Benzamide, N-[[5-[[4-[(2-ethylhexyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & Et \\ & & & \\$$

RN 406678-50-0 CAPLUS

CN Benzamide, N-[[5-[[4-(hexylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
O & O & NH-(CH_2)_5-Me \\
\hline
MeO & O & NH-(CH_2)_5-Me \\
\hline
O &$$

RN 406678-51-1 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[2-[3-(trifluoromethyl)phenyl]ethyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

PAGE 1-A

O

$$C-NH-CH_2$$

S

 $NH-CH_2-CH_2$ 

MeO

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CF3

RN 406678-52-2 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[2-(4-methylphenyl)ethyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \circ & \circ & \circ & \circ \\ & & \circ & \circ & \circ & \circ \\ & & C-NH-CH_2 & \circ & \circ & \circ \\ & & & S-N & \circ & \circ \\ & & & & O & \circ \\ & & & & O & \circ \\ & & & & & O & \circ \\ & & & & & & O & \circ \\ & & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & \\ & & & & & \\ & & & & & \\ & & & & & \\ & & & & & \\ & & & & & \\ & & & & & \\ & & & & & \\ & & & & \\ & & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & \\ & & & & \\ & & \\ & & & \\ & & & \\ & & \\ & & & \\ & & & \\ & & & \\ & & \\ & & & \\ & & & \\ & & & \\ & & \\$$

PAGE 1-B

\_\_ Me

RN 406678-53-3 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[(1S,2R)-2-phenylcyclopropyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 406678-55-5 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(1-naphthalenylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

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RN 406678-57-7 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(2-phenylpropyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & &$$

RN 406678-58-8 CAPLUS

CN Benzamide, N-[[5-[[4-[[2-(4-hydroxyphenyl)ethyl]amino]-1-

piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

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$$\begin{array}{c|c} & \circ & \circ & \circ \\ & \parallel & \circ & \circ \\ & C - NH - CH_2 - CH_2 - S - S - N - S - N - CH_2 - CH_2$$

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\_\_ OH

RN 406678-59-9 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(3-phenylpropyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S$   $NH-(CH_2)_3-Ph$ 

RN 406678-60-2 CAPLUS

CN Benzamide, N-[[5-[[4-[(2,3-dihydroxypropyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S$   $NH-CH_2-CH-CH_2-OH$ 

RN 406678-61-3 CAPLUS

CN Benzamide, N-[[5-[[4-[(2-hydroxyethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

RN 406678-62-4 CAPLUS

CN Benzamide, N-[[5-[[4-[(2-[1,1'-biphenyl]-4-ylethyl)amino]-1-

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piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

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PAGE 1-B

\_\_\_ Ph

RN 406678-63-5 CAPLUS

CN Benzamide, N-[[5-[[4-[([1,1'-biphenyl]-3-ylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & & & & & & \\ & & & & & & & \\ & & & & & & \\ & & & & & & \\ & & & & & \\ & & & & & \\ & & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\ & & \\$$

RN 406678-64-6 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[2-(2-thienyl)ethyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-92-0 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[hexyl(2-pyridinylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

C1 O 
$$CH_2$$
 S  $N$   $CH_2$   $N$   $N$   $N$   $N$ 

RN 406678-93-1 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[(cyclohexylmethyl)hexylamino]-1-.piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-94-2 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[hexyl(phenylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-95-3 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[hexyl(3-pyridinylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406678-96-4 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[hexyl(4-pyridinylmethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

C1 
$$O$$
  $Me-(CH2)5  $N$   $N-CH2$   $N$$ 

RN 406678-97-5 CAPLUS

CN Benzamide, N-[[5-[[4-[[(5-bromo-2-furanyl)methyl]hexylamino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-4-chloro-(9CI) (CA INDEX NAME)

RN 406678-98-6 CAPLUS

CN Benzamide, N-[[5-[[4-(butylhexylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-4-chloro-(9CI) (CA INDEX NAME)

RN 406678-99-7 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[hexyl(3-phenylpropyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406679-00-3 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[hexyl(2-phenylethyl)amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

C1 
$$CH_2-CH_2-Ph$$
  $CH_2-CH_2-Ph$   $C$ 

RN 406679-01-4 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(hexylmethylamino)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406679-30-9 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[(pentylamino)methyl]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406679-44-5 CAPLUS

CN Benzamide, 3-methoxy-N-[[5-[[4-[[[4-(trifluoromethyl)phenyl]methyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-, monohydrochloride (9CI) (CA INDEX NAME)

HC1

IT 406486-98-4P 406486-99-5P 406679-36-5P 406679-37-6P 406679-38-7P 406679-39-8P

406679-43-4P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(preparation of pharmaceutically active sulfonamides bearing both lipophilic and ionizable moieties as inhibitors of protein Jun kinases)

RN 406486-98-4 CAPLUS

CN 3-Thiophenecarboxylic acid, 2-(1,4-dioxa-8-azaspiro[4.5]dec-8-ylsulfonyl)-5-[[(3-methoxybenzoyl)amino]methyl]-, ethyl ester (9CI) (CA INDEX NAME)

RN 406486-99-5 CAPLUS

CN 3-Thiophenecarboxylic acid, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[(4-oxo-1-piperidinyl)sulfonyl]-, ethyl ester (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S$   $S$   $N$   $C-OEt$   $C$ 

RN 406679-36-5 CAPLUS

CN Benzamide, N-[[5-[(4-amino-1-piperidinyl)sulfonyl]-2-thienyl]methyl]-3-methoxy-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 406679-35-4 CMF C18 H23 N3 O4 S2

CM 2

CRN 76-05-1 CMF C2 H F3 O2

RN 406679-37-6 CAPLUS

CN Carbamic acid, [1-[[5-[[(3-methoxybenzoyl)amino]methyl]-2-thienyl]sulfonyl]-4-piperidinyl]-, 1,1-dimethylethyl ester (9CI) (CA INDEX NAME)

RN 406679-38-7 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[(4-oxo-1-piperidinyl)sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 406679-39-8 CAPLUS

CN 3-Thiophenecarboxylic acid, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-(octylamino)-1-piperidinyl]sulfonyl]-, ethyl ester (9CI) (CA INDEX NAME)

RN 406679-43-4 CAPLUS

CN Benzamide, N-[[5-[[4-(hydroxymethyl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

REFERENCE COUNT:

THERE ARE 9 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L39 ANSWER 23 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2002:253020 CAPLUS

DOCUMENT NUMBER:

136:279347

TITLE:

Preparation of hydrophilic sulfonamide derivatives as

inhibitors of protein jun kinases

INVENTOR(S):

Halazy, Serge; Church, Dennis; Camps, Montserrat; Rueckle, Thomas; Gotteland, Jean Pierre; Biamonte,

Marco; Arkinstall, Stephen

PATENT ASSIGNEE(S):

Applied Research Systems ARS Holding N.V., Neth.

Antilles

SOURCE:

Eur. Pat. Appl., 27 pp.

CODEN: EPXXDW

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PA'	PATENT NO.						KIND DATE					APPLICATION NO. DATE							
EP	1193	267		•	A1		2002	0403								0000	927		
	R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	MC,	PT,		
		ΙE,	SI,	LT,	LV,	FI,	RO												
CA	2421417				AA		2002	0411		CA 2	001-	2421	417		2	0010	927		
WO	2002	0288	56		<b>A</b> 1		2002	0411		WO 2	001-	IB17	71		2	0010	927		
	W:	ΑE,	AG,	AL,	AM,	AT,	AU,	AZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,		
	•	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	GH,		
		GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	ΚZ,	LC,	LK,	LR,		
							ZW,						-				•		
	RW:	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ.	UG,	ZW.	AT,	BE.	CH,	CY,		
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	US 2004077632 IORITY APPLN. INFO.:										000-			1	_				
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OTHER SO	HER SOURCE(S):					PAT	136:	2793		2	001	101/	, _	•	• 2		721		

$$\begin{array}{c|c}
 & R^1 \\
 & N \\
 & N$$

Title compds. I [Arl= (un) substituted (hetero) aryl; Ar2 = (hetero) aryl AΒ group substituted with at least one hydrophilic substituent; X = 0, S, preferably 0; R1 = H, alkyl, or forms a 5-6-membered ring with Ar1; n = 0-5; Y = (un)substituted 4-12-membered saturated cyclic or bicyclic alkyl containing at least one nitrogen atom, whereby one nitrogen atom within said ring is forming a bond with the sulfonyl group] were prepared For instance, 5-((Diallylamino)methyl)thiophene-2-sulfonyl chloride (preparation given) was treated with 1,4-dioxa-8-azaspiro[4.5] decane to give the corresponding sulfonamide and subsequently converted to the 3-carboethoxy-thiophene derivative (THF, -78°C  $\rightarrow -100$ °C, t-BuLi, EtO2CCl). Deallylation, acylation with 3-methoxybenzoyl chloride, ketal hydrolysis, reductive amination with 3-(trifluoromethylsulfonyl)aniline and saponification provided II in 8 steps in overall yield of 2.5%. I are efficient modulators of the JNK pathway, they are in particular efficient and selective inhibitors of JNK  $\bar{2}$  and  $\bar{3}$ . II had IC50 = 0.01  $\mu M$  for protein

provided II in 8 steps in overall yield of 2.5%. I are efficient modulators of the JNK pathway, they are in particular efficient and selective inhibitors of JNK 2 and 3. II had IC50 = 0.01 µM for protein jun kinase 3 (JNK3). I are useful for the treatment of, e.g., neuronal disorders including epilepsy, Alzheimer's disease, Huntington's disease, Parkinson's disease, retinal diseases, spinal cord injury, etc. 406486-95-1P, 5-[[[3-Methoxybenzoyl]amino]methyl]-2-[[4-[3-

406486-95-1P, 5-[[[3-Methoxybenzoy1]amino]methy1]-2-[[4-[3-[[trifluoromethy1]sulfony1]anilino]piperidin-1-y1]sulfony1]thiophene-3carboxylic acid

RL: PAC (Pharmacological activity); RCT (Reactant); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)

(drug; pharmaceutically active hydrophilic sulfonamide derivs. as inhibitors of protein jun kinases)

RN 406486-95-1 CAPLUS

3-Thiophenecarboxylic acid, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]-1-piperidinyl]sulfonyl]- (9CI) (CA INDEX NAME)

IT

CN

MeO 
$$C-NH-CH_2$$
  $S$   $S-CF_3$   $CO_2H$ 

IT **406487-01-2P**, N-[2-Hydroxyethyl]-5-[[[3methoxybenzoyl]amino]methyl]-2-[[4-[3-[[trifluoromethyl]sulfonyl]anilino]p iperidin-1-yl]sulfonyl]thiophene-3-carboxamide 406487-02-3P, N-[[4-[Hydroxymethyl]-5-[[4-[3-[[trifluoromethyl]sulfonyl]anilino]piperidi n-1-yl]sulfonyl]thien-2-yl]methyl]-3-methoxybenzamide 406487-03-4P , 5-[[[3-Methoxybenzoyl]amino]methyl]-2-[[4-[octylamino]piperidin-1yl]sulfonyl]thiophene-3-carboxylic acid 406487-04-5P, N-[[4-[Hydrazinocarbonyl]-5-[[4-[3-[[trifluoromethyl]sulfonyl]anilino]pipe ridin-1-yl]sulfonyl]thien-2-yl]methyl]-3-methoxybenzamide **406487-05-6P**, 5-[[[3-Methoxybenzoyl]amino]methyl]-2-[[4-[3-[[trifluoromethyl]sulfonyl]anilino]piperidin-1-yl]sulfonyl]thiophene-3carboxamide 406487-06-7P, N-[2-[Dimethylamino]ethyl]-5-[[[3methoxybenzoyl]amino]methyl]-2-[[4-[3-[[trifluoromethyl]sulfonyl]anilino]p iperidin-1-yl]sulfonyl]thiophene-3-carboxamide RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(drug; pharmaceutically active hydrophilic sulfonamide derivs. as inhibitors of protein jun kinases)

RN 406487-01-2 CAPLUS

CN

3-Thiophenecarboxamide, N-(2-hydroxyethyl)-5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]-1-piperidinyl]sulfonyl]- (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S$   $NH$   $S-CF_3$   $C-NH-CH_2-CH_2-OH$ 

RN 406487-02-3 CAPLUS

CN Benzamide, N-[[4-(hydroxymethyl)-5-[[4-[[3-[(trifluoromethyl)sulfonyl]phen yl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-3-methoxy- (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S-CF_3$   $CH_2-OH$ 

RN 406487-03-4 CAPLUS

CN 3-Thiophenecarboxylic acid, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-(octylamino)-1-piperidinyl]sulfonyl]- (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S$   $NH-(CH_2)_7-Me$   $NH-(CH_2)_7-Me$   $CO_2H$ 

RN 406487-04-5 CAPLUS

CN 3-Thiophenecarboxylic acid, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]-1-piperidinyl]sulfonyl]-, hydrazide (9CI) (CA INDEX NAME)

MeO 
$$C-NH-CH_2$$
  $S-CF_3$   $C-NH-NH_2$   $C-NH-NH_2$ 

RN 406487-05-6 CAPLUS

CN 3-Thiophenecarboxamide, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]-1-piperidinyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN 406487-06-7 CAPLUS

CN 3-Thiophenecarboxamide, N-[2-(dimethylamino)ethyl]-5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]-1-piperidinyl]sulfonyl]- (9CI) (CA INDEX NAME)

IT 406486-98-4P, 3-Ethoxycarbonyl-2-[[1,4-dioxa-8-azaspiro[4.5]dec-8-yl]sulfonyl]-5-[[[3-methoxybenzoyl]amino]methyl]thiophene 406486-99-5P, Ethyl 5-[[[3-methoxybenzoyl]amino]methyl]-2-[[4-oxopiperidin-1-yl]sulfonyl]thiophene-3-carboxylate 406487-00-1P, Ethyl 5-[[[3-methoxybenzoyl]amino]methyl]-2-[[4-[3-[[trifluoromethyl]sulfonyl]anilino]piperidin-1-yl]sulfonyl]thiophene-3-carboxylate

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(intermediate; pharmaceutically active hydrophilic sulfonamide derivs. as inhibitors of protein jun kinases)

RN 406486-98-4 CAPLUS

3-Thiophenecarboxylic acid, 2-(1,4-dioxa-8-azaspiro[4.5]dec-8-ylsulfonyl)-5-[[(3-methoxybenzoyl)amino]methyl]-, ethyl ester (9CI) (CA INDEX NAME)

MeO 
$$\begin{array}{c} O \\ \parallel \\ C-NH-CH_2 \end{array}$$
  $\begin{array}{c} S \\ \parallel \\ S \\ O \end{array}$   $\begin{array}{c} O \\ \parallel \\ O \end{array}$   $\begin{array}{c} O \\ \parallel \\ O \end{array}$   $\begin{array}{c} O \\ \downarrow \\ O \end{array}$   $\begin{array}{c} O \\ \downarrow \\ O \end{array}$ 

RN 406486-99-5 CAPLUS

CN

CN 3-Thiophenecarboxylic acid, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[(4-oxo-1-piperidinyl)sulfonyl]-, ethyl ester (9CI) (CA INDEX NAME)

RN 406487-00-1 CAPLUS

CN 3-Thiophenecarboxylic acid, 5-[[(3-methoxybenzoyl)amino]methyl]-2-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]-1-piperidinyl]sulfonyl]-, ethyl ester (9CI) (CA INDEX NAME)

REFERENCE COUNT:

5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L39 ANSWER 24 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2002:253015 CAPLUS

DOCUMENT NUMBER:

136:279217

TITLE:

Pharmaceutically active benzsulfonamides as inhibitors

of JNK proteins

INVENTOR(S):

Halazy, Serge

PATENT ASSIGNEE(S):

Applied Research Systems ARS Holding N.V., Neth.

Antilles

SOURCE:

Eur. Pat. Appl., 25 pp.

CODEN: EPXXDW

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.						DATE								DATE				
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	R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	MC,	PT,		
		ΙE,	SI,	LT,	LV,	FI,	RO	:											
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	W:	ΑE,	AG,	AL,	AM,	AT,	ΑU,	AZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,		
		co,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	GH,		
		GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	KZ,	LC,	LK,	LR,		
		LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW.	MX,	MZ,	NO.	NZ,	PH,	PL,		
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	OS 2004033917 CORITY APPLN. INFO.:															20030908 A 20000927			
LIVIOIVI.	IONIII AIIIM. INFO.,												20010927						
				WO 2001-151773 W 20010927															

OTHER SOURCE(S): MARPAT 136:279217

The present invention is related to benzsulfonamide derivs.

ArlC(:X)NR1(CH2)nAr2SO2Y [I; Arl = (un)substituted aryl, heteroaryl; Ar2 = (un)substituted Ph; X = O, S, preferably O; Rl = H, alkyl, or Rl forms (un)substituted 5-6 membered (un)saturated ring with Arl; n = 0-5, preferably between 1-3 and most preferred 1; Y = (un)substituted 4-12 membered saturated (bi)cyclic alkyl containing at least one N atom, whereby one N atom within said ring is forming a bond with the sulfonyl group thus providing a sulfonamide] notably for use as pharmaceutically active compds., as well as to pharmaceutical formulations containing such benzsulfonamide derivs. Said benzsulfonamide derivs. I are efficient modulators of the JNK pathway, they are in particular efficient and selective inhibitors of JNK 2 and 3. The present invention is furthermore related to novel benzsulfonamide derivs. as well as to methods of their preparation (no phys. data for intermediates and final compds. given).

# IT 406218-86-8P 406218-87-9P 406218-88-0P 406218-89-1P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES

(Uses)

(benzsulfonamides as JNK2 and JNK3 inhibitors for treatment of neuronal disorders, autoimmune diseases, cancer, and cardiovascular disease)

RN 406218-86-8 CAPLUS

CN Benzamide, 4-chloro-N-[[4-[[4-[[(4-chlorophenyl)methyl]amino]-1-piperidinyl]sulfonyl]phenyl]methyl]- (9CI) (CA INDEX NAME)

RN 406218-87-9 CAPLUS

CN Benzamide, 4-chloro-N-[2-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]l-piperidinyl]sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN 406218-88-0 CAPLUS

CN Benzamide, 4-chloro-N-[3-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]l-piperidinyl]sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN 406218-89-1 CAPLUS

CN Benzamide, N-[[3-[[4-(butylamino)-1-piperidinyl]sulfonyl]phenyl]methyl]-4-chloro-(9CI) (CA INDEX NAME)

3

REFERENCE COUNT:

THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L39 ANSWER 25 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2002:107089 CAPLUS

DOCUMENT NUMBER: 136:167182

TITLE: Novel cdc25 phosphatase inhibitors

INVENTOR(S): Prevost, Gregoire; Brezak Pannetier, Marie-Christine; Galcera Contour, Marie-Odile; Thurieau, Christophe;

Goubin-Grammatica, Françoise; Ducommun, Bernard;

Lanco, Christophe

PATENT ASSIGNEE(S): Societe de Conseils de Recherches et d'Applications

Scientifiques (SCRAS), Fr.

SOURCE: PCT Int. Appl., 92 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

LANGUAGE:

Patent French

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

	PATENT NO.						KIND DATE					ICAT:								
						A2 20020 A3 20031			0207							20010726				
									AZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,		
									DM,											
					-			-	IS,	-			-					-		
•									MG,											
			RO,	RU,	SD,	SE,	SG,	SI,	SK,	SL,	ТJ,	TM,	TR,	TT,	TZ,	UA,	UG,	US,		
			UZ,	VN,	YU,	ZA,	ZW													
		RW:	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZW,	AM,	ΑZ,	BY,	KG,		
			KZ,	MD,	RU,	TJ,	TM,	AT,	BE,	CH,	CY,	DE,	DK,	ES,	FI,	FR,	GB,	GR,		
			IE,	IT,	LU,	MC,	NL,	PT,	SE,	TR,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,		
			GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG										
	FR	2812	198			<b>A</b> 1		2002	0201		FR 2	000-	9900			2	0000	728		
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		R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	MC,	PT,		
			IE,	SI,	LT,	LV,	FI,	RO,	MK,	CY,	AL,	TR								
	BR	2001	0128	24		Α		2004	0210		BR 2	001-	1282	4		2	0010	726		
	JP	2004	5066	18		Т2		2004	0304		JP 2	002-	5152	39		2	0010	726		
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PRIOR	PRIORITY APPLN. INFO.:										FR 2	000-	9900		Ĭ	A 2	0000	728		
										1	WO 2	001-	FR24	43	I	v 2	0010	726		

#### OTHER SOURCE(S):

MARPAT 136:167182

AB Novel cdc25 phosphatase inhibitors, particularly cdc25-C inhibitors, A-B-N(W)-X-Y [A = (un)substituted Ph, 2-naphthyl; B = CO, NHCO(CH2)n, (CH2)p; n = 0-3; p = 0, 1; W = H, alkyl; X = (CH2)q, (CH2)qNH, CO(CH2)r; q = 1-6; r = 0-6; N(W)X = (un)substituted diazacycloalkyl; Y = (un)substituted Ph] were prepared Thus, 4-02NC6H4CH2CH2NMeCH2C6H3(NMe2)OH-5,2 was obtained from 4-02NC6H4CH2CH2NHMe and 5,2-Me2N(HO)C6H3CHO by reductive alkylation. This compound had an IC50 < 100 $\mu$ M for inhibition of recombinant cdc25-C phosphatase and for inhibition of Mia-Paca2 cell proliferation.

#### IT 396074-15-0P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of phenol and naphthol derivs. as inhibitors of cdc25-C phosphatase)

## 10/070,954

RN 396074-15-0 CAPLUS

CN 2-Naphthalenecarboxamide, 3,7-dihydroxy-N-[[3-[(4-methyl-1-piperidinyl)sulfonyl]phenyl]methyl]- (9CI) (CA INDEX NAME)

IT 396074-21-8P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(preparation of phenol and naphthol derivs. as inhibitors of cdc25-C phosphatase)

RN 396074-21-8 CAPLUS

CN Piperidine, 1-[[3-[(1,3-dihydro-1,3-dioxo-2H-isoindol-2-yl)methyl]phenyl]sulfonyl]-4-methyl- (9CI) (CA INDEX NAME)

L39 ANSWER 26 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2002:72070 CAPLUS

DOCUMENT NUMBER:

INVENTOR(S):

136:134677

TITLE:

Substituted 2-(S)-hydroxy-3-[(piperidin-4-ylmethyl)amino]propyl ethers and substituted 2-aryl-2-(R)-hydroxy-1-(piperidin-4-yl-

methyl)ethylamines as beta-3 adrenergic receptor agonists, antidiabetics, and antiobesity agents

Steffan, Robert John; Ashwell, Mark Anthony; Pelletier, Jeffrey Claude; Solvibile, William Ronald;

Matelan, Edward Martin

PATENT ASSIGNEE(S):

American Home Products Corporation, USA

SOURCE:

PCT Int. Appl., 216 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PA	TENT .	NO.			KIND		DATE	•	APPLICATION NO.							DATE		
					A2 200201					WO 2	001-	US22:	363	,	20010716			
WO	2002	0062	55		A3 20020321													
	W:	ΑE,	AG,	ΑL,	AM,	AT,	ΑU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	ΒZ,	CA,	CH,	CN,	
,		co,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	GH,	
		GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	KZ,	LC,	LK,	LR,	
		LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NO,	NZ,	PL,	PT,	
							SI,											
		VN,	YU,	ZA,	ZW,	AM,	AZ,	BY,	KG,	KZ,	MD,	RU,	ТJ,	TM				
	RW:	GH,	GM,	KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZW,	AT,	BE,	CH,	CY,	
		DE,	DK,	ES,	FI,	FR,	GB,	GR,	IE,	IT,	LU,	MC,	NL,	PT,	SE,	TR,	BF',	
		ВJ,	CF,	CG,	CI,	CM,	GA,	GN,	GW,	ML,	MR,	NE,	SN,	TD,	TG		•	
US	2002	0379	07		A1		2002	0328		US 2	001-	9037	38		2	0010	712	
	6506			В2		2003	0114											
PRIORIT	PRIORITY APPLN. INFO.:									US 2	000-	2187	53P		P 2	0000	717	
OTHER S	OTHER SOURCE(S):						136:	1346′	77									
GI	J1																	

#### \* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT \*

AB The invention provides title compds. I and their pharmaceutically acceptable salts [wherein A = OCH2, bond; R = (un)substituted aryl or certain N/O/S heterocyclyl; R1 = (cyclo)alkyl, alkoxy, (cyclo)alkylamino, (un) substituted aryl, arylamino, arylalkyl, or heterocyclyl; Z = bond, SO2, CO]. I are useful in treating or inhibiting metabolic disorders related to insulin resistance or hyperglycemia (typically associated with obesity or glucose intolerance), atherosclerosis, gastrointestinal disorders, neurogenic inflammation, glaucoma, ocular hypertension, and frequent urination. The compds. are particularly useful in the treatment or inhibition of type II diabetes. They are also useful for increasing lean meat deposition and/or increasing the lean meat to fat ratio in animals, particularly mammals. Approx. 240 individual compds. and addnl. salts were prepared by either standard or combinatorial methods. For instance, invention compound II was prepared by reaction of the (S)-isomeric epoxide III with the corresponding amine. II had an EC50 of 0.001 µM against

#### 10/070,954

cloned human  $\beta$ 3 adrenoceptors in vitro, with a maximal response comparable to isoproterenol.

**392690-00-5P**, N-[[5-[[4-[[[(2S)-3-[4-(Benzyloxy)phenoxy]-2-IΤ hydroxypropyl]amino]methyl]piperidin-1-yl]sulfonyl]thien-2yl]methyl]benzamide 392690-02-7P, N-[[5-[[4-[[[(2S)-2-Hydroxy-3-(4-hydroxyphenoxy)propyl]amino]methyl]piperidin-1-yl]sulfonyl]thien-2yl]methyl]benzamide 392690-04-9P, N-[[5-[[4-[[(2S)-3-(9H-Carbazol-4-yloxy)-2-hydroxypropyllaminolmethyllpiperidin-1yl]sulfonyl]thien-2-yl]methyl]benzamide 392690-06-1P, N-[[5-[[4-[[[(2S)-2-Hydroxy-3-[(2-oxo-2,3-dihydro-1H-benzimidazol-4yl)oxy]propyl]amino]methyl]piperidin-1-yl]sulfonyl]thien-2yl]methyl]benzamide 392690-08-3P, N-[[5-[[4-[[[(2R)-2-Hydroxy-2-[4-hydroxy-3-[(methylsulfonyl)amino]phenyl]ethyl]amino]methyl]piperidin-1yl]sulfonyl]thien-2-yl]methyl]benzamide RL: CPN (Combinatorial preparation); PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); CMBI (Combinatorial study); PREP (Preparation); USES (Uses) (drug candidate; preparation of piperidine hydroxyaminopropyl ether and

hydroxyethylamine derivs. as  $\beta 3$  adrenergic receptor agonists, antidiabetics, and antiobesity agents)

392690-00-5 CAPLUS RN

Benzamide, N-[[5-[[4-[[(2S)-2-hydroxy-3-[4-(phenylmethoxy)phenoxy]propyl]]CN amino[methyl]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

PAGE 1-B

Ph

392690-02-7 CAPLUS RN

Benzamide, N-[[5-[[4-[[(2S)-2-hydroxy-3-(4-hydroxyphenoxy)propyl]amino]methyl]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 392690-04-9 CAPLUS

CN Benzamide, N-[[5-[[4-[[[(2S)-3-(9H-carbazol-4-yloxy)-2-hydroxypropyl]amino]methyl]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-(9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 392690-06-1 CAPLUS

CN Benzamide, N-[[5-[[4-[[[(2S)-3-[(2,3-dihydro-2-oxo-1H-benzimidazol-4-yl)oxy]-2-hydroxypropyl]amino]methyl]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 392690-08-3 CAPLUS

CN Benzamide, N-[[5-[[4-[[[(2R)-2-hydroxy-2-[4-hydroxy-3-[(methylsulfonyl)amino]phenyl]ethyl]amino]methyl]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME) Absolute stereochemistry.

(CA

piperidinyl]sulfonyl]phenyl]amino]carbonyl]-, methyl ester (9CI)

Absolute stereochemistry.

INDEX NAME)

392689-15-5p, lH-Indazole-3-carboxylic acid[4-[4-[[[(2S)-2-hydroxy3-(4-hydroxyphenoxy)propyl]amino]methyl]piperidine-1-sulfonyl]phenyl]amide
392689-17-7p, l-[4-[4-[[(2S)-2-Hydroxy-3-(4hydroxyphenoxy)propyl]amino]methyl]piperidine-1-sulfonyl]phenyl]-3methylimidazolidin-2-one 392689-35-9p, (2S)-1-[[4-[[(2R)-2Hydroxy-2-[4-hydroxy-3-[(methylsulfonyl)amino]phenyl]ethyl]amino]methyl]pi

peridin-1-yl]sulfonyl]anilino]carbonyl]pyrrolidine-2-carboxylic acid
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU
(Therapeutic use); BIOL (Biological study); PREP (Preparation); USES
(Uses)

(drug candidate; preparation of piperidine hydroxyaminopropyl ether and hydroxyethylamine derivs. as  $\beta 3$  adrenergic receptor agonists, antidiabetics, and antiobesity agents)

RN 392689-15-5 CAPLUS

CN 1H-Indazole-3-carboxamide, N-[4-[[4-[[(2S)-2-hydroxy-3-(4-hydroxyphenoxy)propyl]amino]methyl]-1-piperidinyl]sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

PAGE 1-B

RN 392689-17-7 CAPLUS

CN 4-Piperidinemethanamine, N-[(2S)-2-hydroxy-3-(4-hydroxyphenoxy)propyl]-1[[4-(3-methyl-2-oxo-1-imidazolidinyl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 392689-35-9 CAPLUS
CN L-Proline, 1-[[[4-[[(2R)-2-hydroxy-2-[4-hydroxy-3[(methylsulfonyl)amino]phenyl]ethyl]amino]methyl]-1piperidinyl]sulfonyl]phenyl]amino]carbonyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

392691-79-1P, [[1-[[4-[(1H-Indazol-3-ylcarbonyl)amino]phenyl]sulfo nyl]-4-piperidinyl]methyl]carbamic acid tert-butyl ester 392691-80-4P, 1H-Indazole-3-carboxylic acid [4-[(4-(aminomethyl)-1piperidinyl]sulfonyl)phenyl]amide 392691-84-8P,  $\hbox{\tt [[1-[4-(3-Methyl-2-oxoimidazolidin-1-yl)benzenesulfonyl]piperidin-4-without and the property of the prop$ yl]methyl]carbamic acid tert-butyl ester 392691-85-9P, 1-[4-[4-(Aminomethyl)piperidine-1-sulfonyl]phenyl]-3-methylimidazolidin-2one 392692-13-6P, (2S)-1-[[4-(4-Dimethoxymethylpiperidine-1sulfonyl)phenyl]carbamoyl]pyrrolidine-2-carboxylic acid methyl ester 392692-14-7P, (2S) -1-[[4-(4-Formylpiperidine-1sulfonyl)phenyl]carbamoyl]pyrrolidine-2-carboxylic acid methyl ester 392692-46-5P, 1H-Indazole-3-carboxylic acid [4-[[4-(aminomethyl)-1piperidinyl]sulfonyl]phenyl]amide formate salt RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent) (intermediate; preparation of piperidine hydroxyaminopropyl ether and hydroxyethylamine derivs. as  $\beta$ 3 adrenergic receptor agonists, antidiabetics, and antiobesity agents) RN 392691-79-1 CAPLUS Carbamic acid, [[1-[[4-[(1H-indazol-3-ylcarbonyl)amino]phenyl]sulfonyl]-4-CN

piperidinyl]methyl]-, 1,1-dimethylethyl ester (9CI) (CA INDEX NAME)

RN 392691-80-4 CAPLUS

CN 1H-Indazole-3-carboxamide, N-[4-[[4-(aminomethyl)-1-piperidinyl]sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN 392691-84-8 CAPLUS

CN Carbamic acid, [[1-[[4-(3-methyl-2-oxo-1-imidazolidinyl)phenyl]sulfonyl]-4-piperidinyl]methyl]-, 1,1-dimethylethyl ester (9CI) (CA INDEX NAME)

RN 392691-85-9 CAPLUS

CN 4-Piperidinemethanamine, 1-[[4-(3-methyl-2-oxo-1-imidazolidinyl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

10/070,954

RN 392692-13-6 CAPLUS

CN L-Proline, 1-[[[4-[[4-(dimethoxymethyl)-1-piperidinyl]sulfonyl]phenyl]amin o]carbonyl]-, methyl ester (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 392692-14-7 CAPLUS

CN L-Proline, 1-[[[4-[(4-formyl-1-piperidinyl)sulfonyl]phenyl]amino]carbonyl]-, methyl ester (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 392692-46-5 CAPLUS

CN Formic acid, compd. with N-[4-[[4-(aminomethyl)-1-piperidinyl]sulfonyl]phenyl]-1H-indazole-3-carboxamide (9CI) (CA INDEX NAME)

10/070,954

CM 1

CRN 392691-80-4 CMF C20 H23 N5 O3 S

CM 2

CRN 64-18-6 CMF C H2 O2

о=== СН- ОН

L39 ANSWER 27 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2001:816614 CAPLUS

DOCUMENT NUMBER:

135:357944

TITLE:

Preparation of nitrophenylcarboxamide derivatives as

peroxisome proliferator-activated receptor (PPAR)

 $\gamma$  modulators

INVENTOR(S):

Amemiya, Yoshiya; Wakabayashi, Kenji; Takaishi,

Sachiko; Fukuda, Chie

PATENT ASSIGNEE(S):

Sankyo Company, Ltd., Japan

SOURCE:

PCT Int. Appl., 186 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

Ι

LANGUAGE:

Japanese

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
	A1	20011108	WO 2001-JP3655	20010426
W: AU, BR, CA	CN, CZ	, HU, ID,	IL, IN, KR, MX, NO,	NZ, PL, RU, US, ZA
RW: AT, BE, CH	CY, DE	, DK, ES,	FI, FR, GB, GR, IE,	IT, LU, MC, NL,
PT, SE, TR				
CA 2407587	AA	20011108	CA 2001-2407587	20010426
AU 2001052612	A5	20011112	AU 2001-52612	20010426
EP 1277729	A1	20030122	EP 2001-925984	20010426
R: AT, BE, CH	DE, DK	, ES, FR,	GB, GR, IT, LI, LU,	NL, SE, MC, PT,
IE, FI, CY	TR			
BR 2001010428	Α	20030617	BR 2001-10428	20010426
JP 2002332266	A2	20021122	JP 2001-130983	20010427
ZA 2002008465	Α	20040212	ZA 2002-8465	20021018
us 2003134859	A1	20030717	US 2002-278387	20021023
NO 2002005142	Α	20021227	NO 2002-5142	20021025
PRIORITY APPLN. INFO.:			JP 2000-129565	A 20000428
			JP 2001-60366	A 20010305
			WO 2001-JP3655	W 20010426
OTHER SOURCE(S):	MARPAT	135:3579	4 4	

$$(BX)_{n}-A-N$$

$$O$$

$$NO_{2}$$

AB The title compds. I [A represents Ph, etc.; B represents aryl, etc.; X represents oxygen, etc.; and n is 0 or 1] are prepared I are remedies for involutional osteoporosis which inhibit the accelerated differentiation of adipocytes and promote the formation and differentiation of osteoblasts from stem cells; I are also remedies for diabetes. In an in vitro test for PPAR γ modulating activity, N-[4-(4-methylpiperazin-1-ylcarbonyl)phenyl]-(2-chloro-5-nitrophenyl)carboxamide showed IC50 value of 0.6 nM.

IT 372095-22-2P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological

# 10/070,954

REFERENCE COUNT:

THERE ARE 34 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

ANSWER 28 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

SESSION NUMBER: 2001:396661 CAPLUS

135:19547 DOCUMENT NUMBER:

Preparation of sulfonamides and sulfinamides as NPY Y5 TITLE:

antagonists

Kawanishi, Yasuyuki; Takenaka, Hideyuki; Hanasaki, INVENTOR(S):

Kohji; Okada, Tetsuo

Shionogi & Co., Ltd., Japan PCT Int. Appl., 273 pp. PATENT ASSIGNEE(S):

Patent

SOURCE:

CODEN: PIXXD2

DOCUMENT TYPE:

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

1	PATENT NO.							DATE				LICAT										
	 WO	2001	03782	26		A1						2000-					20001	121				
		W:	ΑE,	AG,	AL,	AM,	ΑT,	ΑU,	BA,	BB	, BG,	BR,	BY,	BZ,	CA,	CH,	CN,					
												, FI,										
			HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KR	, KZ,	LC,	LK,	LR,	LS,	LT,	LU,				
			LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ	, NO,	NZ,	PL,	PT,	RO,	RU,	SD,				
			SE,	SG,	SI,	SK,	SL,	ТJ,	TM,	TR,	TT	, TZ,	UA,	UG,	US,	UZ,	VN,	ΥU,				
			ZA,	ZW,	AM,	ΑZ,	BY,	KG,	KZ,	MD,	RU	, TJ,	TM									
		RW:										, TZ,										
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												2000-					20001					
1	ΑU	2001	0141	86		<b>A</b> 5		2001	0604		AU	2001-	1418	6		2	20001	121				
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		R:										, IT,			NL,	SE,	, MC,	PT,				
			ΙE,	SI,	LT,	LV,	FI,	RO,	MK,	CY,	ΑI	, TR										
	ZA	2002										2002-										
1	US	6699	891			В1		2004	0302		US	2.002-	-1119	81		- 2						
]	NO	2002	0024	81		Α		2002	0726		ИО	2002-	2481			- 3	20020					
												2003-					20031	)425 )501 )524 ,230				
1	US	2004	1809	64		A1		2004	0916			2003-					20031					
PRIOR	PRIORITY APPLN. INFO.:											1999-		-			19991					
												1999-					19991					
												2000-					20001					
											US	2002-	-1119	81		A3 :	20020	501				
OTHER	THER SOURCE(S):						MARPAT 135:1954															

$$t-Bu$$
 $SO_2-N$ 
 $H$ 
 $C-N$ 
 $N$ 

The title compds. R1S(O)nN(R2)XYZ [R1 represents lower alkyl, cycloalkyl, AΒ etc.; R2 represents hydrogen, lower alkyl, etc.; n is 1 or 2; X represents

GΙ

lower alkylene, lower alkenylene, arylene, cycloalkylene, etc.; Y represents CONR7, CSNR7, NR7CO, NR7CS, etc. (wherein R7 represents hydrogen or lower alkyl); and Z represents lower alkyl, an optionally substituted hydrocarbon ring, an optionally substituted heterocycle, etc.] are prepared In an in vitro test for affinity for the neuropeptide Y5 receptors, the title compound I showed the IC50 value of 0.4 nM. Formulations are given.

IT 342577-45-1P 342577-46-2P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of sulfonamides and sulfinamides as NPY Y5 antagonists)

RN 342577-45-1 CAPLUS

CN Cyclohexanecarboxamide, 4-[[(1,1-dimethylethyl)sulfonyl]amino]-N-[4-(1-piperidinylsulfonyl)phenyl]-, trans- (9CI) (CA INDEX NAME)

Relative stereochemistry.

RN 342577-46-2 CAPLUS

CN Cyclohexanecarboxamide, 4-[[(1,1-dimethylethyl)sulfonyl]amino]-N-[3-(1-piperidinylsulfonyl)phenyl]-, trans- (9CI) (CA INDEX NAME)

Relative stereochemistry.

REFERENCE COUNT:

14 THERE ARE 14 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

10,070,954

m L'39 ANSWER 29 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2001:246567 CAPLUS

DOCUMENT NUMBER: 134:280858

TITLE: Preparation of N-thienylsulfonylpiperazines and

analogs as c-Jun N-terminal kinase inhibitors

INVENTOR(S): Arkinstall, Stephen

PATENT ASSIGNEE(S): Applied Research Systems ARS Holding N.V., Neth.

Antilles

SOURCE: Eur. Pat. Appl., 35 pp.

CODEN: EPXXDW

DOCUMENT TYPE:

LANGUAGE:

Patent English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PAI	TENT 1	NO.			KIND DATE					APP	LI	CAT	ION 1	10.		D:	ATE			
EP	1088	821			A1		2001	0404		ΕP	19	99-1	3108	69		1	9990:	928		
	R:																			
		ΙE,	SI,	LŢ,	LV,															
	2379															20000928				
WO	2001								WO 2000-IB1380							20000928				
	W:	ΑE,	AG,	AL,	AM,	AT,	AU,	ΑZ,	BA,	BE	3,	BG,	BR,	BY,	ΒZ,	CA,	CH,	CN,		
		CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EE,	ES	3,	FI,	GB,	GD,	GE,	GH,	GM,	HR,		
		HU,	ID,	IL,	IN,	IS,	JP,	ΚE,	KG,	KP	2,	KR,	ΚŻ,	LC,	LK,	LR,	LS,	LT,		
		LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX	ζ,	MZ,	NO,	NZ,	PL,	PT,	RO,	RU,		
		SD,	SE,	SG,	SI,	SK,	SL,	ТJ,	TM,	TF	₹,	TT,	TZ,	UA,	UG,	US,	UΖ,	VN,		
		YU,	ZA,	ZW,	AM,	ΑZ,	BY,	KG,	ΚZ,	MI	),	RU,	ТJ,	TM						
	RW:							SD,												
		DE,	DK,	ES,	FI,	FR,	GB,	GR,	IE,	II	Γ,	LU,	MC,	NL,	PT,	SE,	BF,	ВJ,		
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EP	1218														0000					
	R:	ΑT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GF	₹,	IT,	LI,	LU,	NL,	SE,	MC,	PT,		
		ΙE,	SI,	LT,	LV,			MK,	-											
TR	2002	0078	9		Т2		2002	0821		TR	20	002-	2002	0078	9	2	0000	928		
	2003							0318						30		_	0000			
EE	2002	0016	5		Α		2003	0415		EE	20	002-	165			2.	0000	928		
	5174							0130					5174				0000			
ZA 2002001509					A		2003	0224		ZA	20	002-	1509			2	0020			
BG 106527						A 20030228											0020			
NO 2002001530					Α		2002	0326					1530				0020			
IORITY APPLN. INFO.:								•					8108 IB13				9990 0000			
														- •		·· -				

AB RC(:X)NR1(CH2)nZSO2R2 [I; R = (un)substituted (hetero)aryl; R1 = H or

MARPAT 134:280858

OTHER SOURCE(S):

GI

(un)substituted alkyl; RR1 = atoms to complete a ring; R2 = N-attached (poly)aza(bi)cycloalkyl; X = O or S; Z = (un)substituted (hetero)aryene; n = 0-5] were prepared Thus, 2-thiophenemethanamine was amidated by 4-ClC6H4COCl and the chlorosulfonated product amidated by piperazine to give title compound II. Data for biol. activity of I were given.

IT 332415-52-8P 332415-54-0P 332415-57-3P 332415-59-5P 332415-61-9P 332415-65-3P 332415-75-5P 332415-79-9P 332416-11-2P 332416-15-6P 332416-22-5P 332416-25-8P 332416-27-0P 332416-32-7P 332416-33-8P 332416-34-9P 332416-35-0P 332416-40-7P

332416-41-8P 332421-97-3P
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of N-thienylsulfonylpiperazines and analogs as c-Jun N-terminal kinase inhibitors)

RN 332415-52-8 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[(4-hydroxy-4-phenyl-1-piperidinyl)sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & & & \\ & &$$

RN 332415-54-0 CAPLUS

CN Benzamide, N-[[5-[(4-benzoyl-1-piperidinyl)sulfonyl]-2-thienyl]methyl]-4-chloro-(9CI) (CA INDEX NAME)

RN 332415-57-3 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(2,3-dihydro-2-oxo-1H-benzimidazol-1-yl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & &$$

## 10/070,954

RN 332415-59-5 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(phenylmethyl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 332415-61-9 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[(4-oxo-1-phenyl-1,3,8-triazaspiro[4.5]dec-8-yl)sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 332415-65-3 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(hydroxydiphenylmethyl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 332415-75-5 CAPLUS

CN Benzamide, N-[[5-[[4-(1H-benzotriazol-1-yl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-4-chloro-(9CI) (CA INDEX NAME)

RN 332415-79-9 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(2,4-difluorobenzoyl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

C1 
$$C = NH - CH_2$$
  $S = N$   $C = F$ 

RN 332416-11-2 CAPLUS

CN Carbamic acid, [1-[[5-[[(4-chlorobenzoyl)amino]methyl]-2-thienyl]sulfonyl]-4-piperidinyl]-, 1,1-dimethylethyl ester (9CI) (CA INDEX NAME)

RN 332416-15-6 CAPLUS

CN Benzamide, 4-chloro-N-[[5-(1-piperidinylsulfonyl)-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 332416-22-5 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[3-hydroxy-4-[3-(trifluoromethyl)phenyl]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 332416-25-8 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(phenylmethoxy)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} \text{C1} & \text{O} & \text{O-CH}_2\text{-Ph} \\ \hline \\ \text{C-NH-CH}_2 & \text{S} & \text{S} \\ \hline \\ \text{O} & \text{O} \end{array}$$

RN 332416-27-0 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[(4-hydroxy-1-piperidinyl)sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 332416-32-7 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-hydroxy-4-(phenylmethyl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

C1 
$$CH_2-Ph$$

RN 332416-33-8 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[[3-[(trifluoromethyl)sulfonyl]phenyl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 332416-34-9 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-[[2-(1,1-dimethylethyl)-1H-indol-5-yl]amino]-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} O & O & NH \\ \hline C-NH-CH_2 & S & S & NH \\ \hline \end{array}$$

RN 332416-35-0 CAPLUS

CN Benzeneacetamide, N-[1-[[5-[[(4-chlorobenzoyl)amino]methyl]-2-thienyl]sulfonyl]-4-piperidinyl]- (9CI) (CA INDEX NAME)

RN 332416-40-7 CAPLUS

CN Benzamide, N-[[5-[[4-(2H-benzotriazol-2-yl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]-4-chloro-(9CI) (CA INDEX NAME)

RN 332416-41-8 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(5-chloro-2H-benzotriazol-2-yl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

RN 332421-97-3 CAPLUS

CN Benzamide, 4-chloro-N-[[5-[[4-(4-chlorobenzoyl)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

REFERENCE COUNT:

THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

10/070,954

ANSWER 30 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

2001:246566 CAPLUS ACCESSION NUMBER:

DOCUMENT NUMBER: 134:280864

Preparation of 6-azauracil derivatives as thyroid TITLE:

receptor ligands

Dow, Robert Lee; Chiang, Yuan-Ching Phoebe; Estep, INVENTOR(S):

Kimberly Gail

PATENT ASSIGNEE(S): Pfizer Products Inc., USA SOURCE:

Eur. Pat. Appl., 153 pp.

CODEN: EPXXDW

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PAT	ENT	NO.			KINI	DAT	E	P	APPI	LICAT		Γ	ATE			
		1088				A2		10404	E	EP 2	2000-	3081	12		2	0000	918
	EP	P 1088819 R: AT, BE, CH, IE, SI, LT,				A3 DE,	DK, ES	10411 , FR,	GB,	GR,	, IT,	LI,	LU,	NL,	SE,	MC,	PT,
	מז	2001	IE,	•	LT,	LV,	-	) 10424		TD 1	2000-	2828	82		2	0000	919
		6787		00		B1		40907	_		2000-					0000	
	CA	2321	380			AA	. 200	10330			2000-					0000	
	BR	2000	0045	39		Α		10417	_		2000-					0000	
	~~		1578			A1	200	40812	_		2004-				_	0040	
PRIORITY APPLN. INFO.:									_		1999- 2000-					.9990 :0000	

OTHER SOURCE(S):

MARPAT 134:280864

GΙ

Title compds. [I; W = O, S, SO, SO2, NR30, CO, CH:CH, CH2, CHF, CF2, AΒ CH(OH); R1, R2 = H, halo, alkyl, cyano, OR12, CF3; R3 = H, halo, cyano, NO2, (substituted) alkyl, etc.; R4 = CR14R15R16, CONR19R20, aryl, heteroaryl, etc.; R3R4 = (CH2)b, Q(CH2)c, etc.; b = 3-7; c = 2-6; R5 =OR23; R4R5 = CR31:CR32NH, CR31:CR32S, etc.; R7 = H, alkyl, haloalkyl, (CH2) nCO2R9; n = 0-3; R8 = H, alkyl, CO2R9, CONR10R11; R9 = (substituted)alkyl, alkenyl, dialkenyl, cycloalkyl, aryl, heterocyclyl; R10, R11 = H, (substituted) alkyl, cycloalkyl, alkenyl, heterocyclyl; R10R11 = heterocyclyl; R12 = H, (substituted) alkyl; R14 = H, alkyl, OR34; R15 = H, alkyl; R14R15 = 0; R16 = H, (substituted) alkyl, alkylcycloalkyl, alkylaryl, alkylheterocyclyl; R19, R20 = H, (substituted) alkyl, aryl, aralkyl, heterocyclyl, heterocyclylalkyl, cycloalkyl, etc.; R23 = H, (substituted) alkyl, COR24; R24 = H, (substituted) alkyl, alkenyl, cycloalkyl, aryl, heteroaryl; R30 = H, (substituted) alkyl, alkenyl, cycloalkyl, COR31, etc.; R31 = H, (substituted) alkyl, alkenyl,

cycloalkyl, aryl, heteroaryl, etc.; R32 = H, (substituted) alkyl, alkenyl, cycloalkyl, aryl, heterocyclyl; R34 = (substituted) aryl, heterocyclyl, alkyl, alkenyl, cycloalkyl], were prepared for treatment of obesity, hyperlipidemia, thyroid disease, hypothyroidism, thyroid cancer, diabetes, atherosclerosis, hypertension, coronary heart disease, hypercholesteremia, depression, osteoporosis, cardiac arrhythmia, glaucoma and heart failure (no data). Thus, [[[4-(3-bromo-4-methoxyphenoxy)-3,5-dimethylphenyl]hydrazono]cyanoacetyl]carbamic acid Et ester (preparation given) was heated with KOAc in HOAc at 120° for 5 h to give 2-[4-(3-bromo-4-methoxyphenoxy)-3,5-dimethylphenyl]-3,5-dioxo-2,3,4,5-tetrahydro-1,2,4-triazine-6-carbonitrile.

## IT · 332927-26-1P

CN

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of azauracil derivs. as thyroid receptor ligands)

RN 332927-26-1 CAPLUS

Piperidine, 1-[[5-chloro-7-(4,5-dihydro-3,5-dioxo-1,2,4-triazin-2(3H)-yl)-2-hydroxy-9H-xanthen-3-yl]sulfonyl]- (9CI) (CA INDEX NAME)

L39 ANSWER 31 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2001:228868 CAPLUS

DOCUMENT NUMBER: 134:252356

TITLE: Preparation of 2-(arylamino)-4-quinazolinols as

inhibitors of cleavage of protein substrates by

caspase-3

Jacobs, Robert Toms; Folmer, James; Simpson, Thomas INVENTOR(S):

Richard; Chaudhari, Bipinchandra; Frazee, William

Jackson; Davenport, Timothy Wayne

PATENT ASSIGNEE(S):

Astrazeneca AB, Swed.; Astrazeneca UK Limited

PCT Int. Appl., 71 pp. SOURCE:

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.						KIND DATE			APPLICATION NO.						DATE			
	WO	2001	0215	98		A1	-	2001	0329	,	wo 2	000-	GB35	55		2	0000	918	
		W:	ΑE,	ΑG,	AL,	AM,	AT,	ΑU,	AZ,	BA,	BB,	BG,	BR,	BY,	BZ,	CA,	CH,	CN,	
			CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EE,	ES,	FI,	GB,	GD,	GE,	GH,	GM,	HR,	
			HU,	ID,	IL,	IN,	IS,	JP,	ΚE,	KG,	KP,	KR,	KZ,	LC,	LK,	LR,	LS,	LT,	
			LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MZ,	NO,	NZ,	PL,	PT,	RO,	RU,	
	SD, SE, SG ZA, ZW, AM RW: GH, GM, KE		SG,	SI,	SK,	SL,	ТJ,	TM,	TR,	TT,	TZ,	UA,	UG,	UZ,	VN,	YU,			
			AM,	ΑZ,	BY,	KG,	ΚZ,	MD,	RU,	ТJ,	TM								
			KE,	LS,	MW,	MZ,	SD,	SL,	SZ,	TZ,	UG,	ZW,	AT,	BE,	CH,	CY,			
			DE,	DK,	ES,	FI,	FR,	GB,	GR,	IE,	IT,	LU,	MC,	NL,	PT,	SE,	·BF,	ВJ,	
			CF,	CG,	CI,	CM,	GΑ,	GN,	GW,	ML,	MR,	NE,	SN,	TD,	TG				
	ΕP	1218	358			A1	2002	0703		EP 2	000-	9589		2	0000	918			
		R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	Lİ,	LU,	NL,	SE,	MC,	PT,	
			ΙE,	SI,	LT,	LV,	FI,	RO,	MK,	CY,	AL								
	JP	2003	5095	01		Т2		2003	0311	JP 2001-524977						2	0000	918	
						В1		2002	0604	US 2000-668322					20000922			922	
PRIO	PRIORITY APPLN. INFO.:				.:						US 1	999-	1556	23P	]	P 1	9990	923	
	•										WO 2000-GB3555					<i>N</i> 2	0000	918	
OTHER SOURCE(S):						MARPAT 134:25235				356									

or4 R5 <sub>R</sub>5' R4' R6 <sub>R</sub>3' Ŕ8 Ι  $\dot{R}^2$ 

AΒ I (e.g. [2-[(3,4-dichlorophenyl)amino]-4-hydroxy-6-nitroquinazolin-8-yl]-N-[(4-fluorophenyl)methyl]carboxamide) or a pharmaceutically-acceptable salt thereof and methods of using such compds. for the treatment of various diseases and pharmaceutical compns. comprising such compds. are claimed.

In I, R2 is H, acetyl or (C1-C5)alkyl. R4 is H, acetyl or (C1-C5)alkyl. R5, R6 and R7 are independently H, halogen, (C1-C2)alkyl, halo(C1-C2)alkyl, nitro and cyano. R8 is H, Ph, (C1-C6)alkyl, Ri, heterocycle, substituted heterocycle, -(CH2)mC(O)N-[(CH2)pRg]Rb, -(CH2)mN[(CH2)pRg]Rb, -CH:CHRC, halogen, -(CH2)mC(0)(CH2)mRo, -C(0)Rp, -(CH2)mC(0)O[(CH2)pRg], -(CH2)mN[(CH2)pRg]C(0)Rb, -(CH2)mOC(0)[(CH2)pRg],-CHORdORe, -CH2XRf, -S(0)2N[(CH2)pRg]Rb, -N[(CH2)pRg]S(0)2Rb, -S(0)2N[(CH2)pRg]Rb, -C(0)H, allyl and 4-hydroxybut-1-en-4-yl. R3', R4' and R5' are independently H, halogen, (C1-C4)alkyl, (C1-C4)alkoxy and halo(C1-C4)alkyl; wherein at least one of R5, R6, R7, R8, R3' and R5' is not H; and R4' is not equal to R7. Rb is H, (C1-C4)alkyl or substituted (C1-C4)alkyl. Rc is H, Ph, Ri, heterocycle, substituted heterocycle, -CO2Rb, -C(O)NRbRb, -S(O)n-Rf, 2-hydroxyisopropyl and cyano. Rd and Re are independently (C1-C4)alkyl; or Rd and Re together are -CH2CH2- or -CH2CH2CH2-. Rf is (C1-C4)alkyl, vinyl, -CH2CO2Rb, Ph or benzyl. Rg is (C1-C10)alkyl, substituted (C1-C10)alkyl, Ph, Ri, heterocycle, substituted heterocycle, -ORb, -NRbRb, -NRjRo, -N(Rj)SO2Rj, -CO2Rb, -C(O)NRjRj, -SO2phenyl and 2-oxopyrrolid-1-yl; or Rg and Rb together form -CH2CH2N(Rj)CH2CH2-, -(CH2)4-, -CH(Rh)CH2CH2-H2-, or -CH2CH2OCH2CH2-. is -CO2Rf or -CH2O-Ph. Ri is Ph, containing 1-3 substituents selected from halogen, (C1-C6)alkyl, -ORj, -O(substituted phenyl)-NRjRj, halo(C1-C6)alkyl, halo(C1-C4)alkoxy, nitro, -C(O)Rj, -C(O)(substituted phenyl), -(CH2)mC(O)NRjRk, -(CH2)mC(O)N(Rj)SO2[(C1-C6)alkyl], -(CH2)mC(0)NRj(substituted phenyl), -(CH2)mC02Rj, -OC(0)Rj, -N(Rj)C(0)Rj, -NRjC(0) halo(C1-C4) alkoxy, -C(0)NRjRj, -NRjS(0)2(C1-C4) alkyl, -SOn(C1-C6)alkyl, -SOn(halogen), -SOm(CH2)nphenyl, -SO2NRjRj, -SO2NRjRk, -SO2NRj(substituted (C1-C6)alkyl), -SO2(CH2)nRo, -SO2N(Rj)(CH2)nRo, -SOn(halo(C1-C3)alkyl), -SOn(pyrrolidin-1-yl substituted in the 2 position by Rn), -CN, -SCN, Ph, heterocycle and benzyl. Rj is H or (C1-C6)alkyl. Rk is -(CH2)nCH2OCH2Rb, -C(O)NRjRj or -C(O)Rj. Rm is heterocycle, containing one or two substituents selected from halogen, (C1-C6)alkyl, -ORj, -O(substituted phenyl)-NRjRj, halo(C1-C6)alkyl, halo(C1-C4)alkoxy, nitro, -C(0)Rj, -C(0)(substituted phenyl), -(CH2)mC(0)NRjRk, -(CH2)mC(0)N(Rj)SO2[(C1-C6)alkyl], -(CH2)mC(0)NRj(substituted phenyl),-(CH2)nCO2Rj, -OC(O)Rj, -N(Ri)C(O)Rj, -NRjC(O)-halo(C1-C4)alkoxy, -C(O)NRjRj, -NRjS(O)2(C1-C4)alkyl, -SOn(C1-C6)alkyl, -SOn(halogen), -SOm(CH2)nphenyl, -SO2NRjRj, -SO2NRjRk, -SO2NRj(substituted (C1-C6)alkyl), -SO2(CH2)nRo, -SO2N(Rj)(CH2)nRo, -SOn(halo(C1-C3)alkyl),-SOn(pyrrolidin-1-yl substituted in the 2 position by Rn), -CN, -SCN, Ph, heterocycle and benzyl. Rn is -C(0)Rj, -CH2ORj or -C(0)NRjRj. Ro is Ph, substituted Ph, heterocycle or substituted heterocycle. Rp is a heterocycle containing one or two substituents selected from substituted Ph, heterocycle, Ph, benzyl, -SOnRo or SO2NRjRj. M is 0-3; n is 0-2; p is 0-7; X is S, O or N. A method is claimed of treating a mammalian disease selected from cell apoptosis, immune deficiency syndromes, autoimmune diseases, pathogenic infections, cardiovascular and neurol. injury, alopecia, aging, cancer, Parkinson's disease, Alzheimer's disease, Huntington's disease, acute and chronic neurodegenerative disorders, stroke, vascular dementia, head trauma, ALS, neuromuscular disease, myocardial ischemia, cardiomyopathy, macular degeneration, osteoarthritis, diabetes, acute liver failure and spinal cord injury. Although caspase-3 inhibition and apoptosis assay methods are described, quant. assay results are not given. Although the methods of preparation are not claimed, 17 example prepns. are included.

## IT 331643-88-0P 331644-94-1P 331645-27-3P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of 2-(arylamino)-4-quinazolinols as inhibitors of cleavage of protein substrates by caspase-3)

RN 331643-88-0 CAPLUS

CN 8-Quinazolinecarboxamide, 2-[(3,4-dichlorophenyl)amino]-1,4-dihydro-6-nitro-4-oxo-N-[3-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
O & & & & \\
N & S & & & \\
O & & & & \\
NH & & & & \\
C & O & & & \\
C1 & & & \\
NH & & & & \\
O & & & & \\
O & & & & \\
\end{array}$$

RN 331644-94-1 CAPLUS

CN 8-Quinazolinecarboxamide, 2-[(3,4-dichlorophenyl)amino]-1,4-dihydro-6-nitro-4-oxo-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN 331645-27-3 CAPLUS

CN 8-Quinazolinecarboxamide, 2-[(3,4-dichlorophenyl)amino]-1,4-dihydro-6-nitro-4-oxo-N-[2-[4-(1-piperidinylsulfonyl)phenyl]ethyl]- (9CI) (CA INDEX NAME)

PAGE 1-A

PAGE 2-A

REFERENCE COUNT:

11 THERE ARE 11 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

▲9 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2001:10086 CAPLUS

DOCUMENT NUMBER: 134:86277

1,3-Diazines with platelet-derived growth factor TITLE:

receptor inhibitory activity

INVENTOR(S): Matsuno, Kenji; Ichimura, Michio; Nomoto, Yuji;

Fujiwara, Shigeki; Ide, Shinichi; Tsukuda, Eiji; Irie,

Junko; Oda, Shoji

PATENT ASSIGNEE(S):

Kyowa Hakko Kogyo Co., Ltd., Japan

Patent

U.S., 127 pp., Cont.-in-part of PCT 9814431. SOURCE:

CODEN: USXXAM

DOCUMENT TYPE:

LANGUAGE: English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PAT	PATENT NO.						KIND DATE			APPL	ICAT	ION	NO.	DATE				
US	6169	088			B1	_	2001	0102	1	 US 1	 998-	8819	 9		19	9980	601	
WO	9814	431			A1		1998	0409	1	wo 1	997-	JP35	10		19	9971	001	
	W:	AU,	BG,	BR,	CA,	CN,	CZ,	HU,	JP,	KR,	MX,	NO,	NZ,	PL,	RO,	SG,	SI,	
		US,	VN,	AM,	, AZ,	BY,	KG,	ΚZ,	MD,	RU,	ТJ,	TM						
	RW:	AT,	BE,	CH,	DE,	DK,	, ES,	FI,	FR,	GB,	GR,	ΙE,	IT,	LU,	MC,	NL,	PT,	SE
US	6207	667			В1		2001	.0327	1	US 2	000-	4815	4 4		20	0000	112	
US					A1		2002	0606	1	US 2	000-	7349	18		2	0001	213	
US	6472	391			B2		2002	1029										
PRIORITY	APP	LN.	INFO	. :					1	JP 1	996-	2607	43	i	A 19	9960	110	
	MIONITI ALLIM. INIO								1	WO 1	997-	JP35	10	1	A2 1	9971	001	
	· .								1	US 1	998-	8819	9	i	A3 19	9980	601	
					US 2000-481544					A3 20000112								
OTHER SC	אווסכב	191 .			MARPAT 134.86277		7											

OTHER SOURCE(S):

MARPAT 134:86277

GΙ

$$R^3$$
  $WCNR^1R^2$ 
 $R^4$ 
 $R^5$ 
 $R^6$ 
 $R^8$ 
 $$Q = -C - NHCH_2$$

1,3-Diazines and related N heterocycles [I; wherein V = 0 or S; W =AB 1,4-piperazinediyl or 1,4-homopiperazinediyl which may be substituted with unsubstituted alkyl on the ring; X = N or CR9; Y = N or CR8; Z = N or CR7, with at least one of X, Y and Z being N; R1 = H, (un) substituted alkyl, cycloalkyl, aryl, heterocyclyl, etc.; R2 = substituted alkyl, (un) substituted cycloalkyl, aryl, heterocyclyl, etc.; R3, R4, R5, R6 = H, halo, (un) substituted alkyl, NO2, cyano, (un) substituted OH or NH2, etc.; R7, R8 = R1 groups, halo, etc.; R9 = H, CO2H or derivs.] and their pharmacol. acceptable salts are prepared These compds. inhibit the phosphorylation of PDGF receptors and the abnormal proliferation or migration of cells, and so are effective in preventing or treating cell proliferative diseases such as arteriosclerosis, vascular reocclusion diseases, cancer, and glomerulosclerosis. Thus, 6,7-dimethoxy-4-(1piperazinyl)quinazoline reacted with Ph isocyanate in refluxing EtOH to give invention compound II [R = CONHPh] in 44% isolated yield. The analog II [R = Q] showed an IC50 of 0.03  $\mu M$  for inhibiting the phosphorylation of PDGF receptor in vitro. Pharmaceutical formulations, e.g. tablets containing II [R = N-(p-nitrophenyl) carbamoyl], were prepared

IT 205257-01-8P

CN

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of 1,3-diazines with platelet-derived growth factor receptor inhibitory activity)

RN 205257-01-8 CAPLUS

1-Piperazinecarbothioamide, 4-(6,7-dimethoxy-4-quinazolinyl)-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

PAGE 1-A

PAGE 2-A

 $\binom{\mathsf{N}}{\mathsf{N}}$ 

REFERENCE COUNT:

THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

10/070,954

1,39 ANSWER 33 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2000:384159 CAPLUS

DOCUMENT NUMBER: 133:30670

Preparation of substituted benzo[de]isoquinoline-1,3-TITLE:

diones as glycoprotein IbIX antagonists

Mederski, Werner; Devant, Ralf; Barnickel, Gerhard; INVENTOR(S):

Bernotat-Danielowski, Sabine; Melzer, Guido; Raddatz, Peter; Wu, Zhengdong; Dhanoa, Daljit; Soll, Richard;

Rinker, James; Graybill, Todd

PATENT ASSIGNEE(S):

Merck Patent G.m.b.H., Germany

SOURCE:

PCT Int. Appl., 278 pp. CODEN: PIXXD2

DOCUMENT TYPE:

Patent English

LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION: DATENT NO

PA'	rent 1	NO.			KINI	)	DATE			APPI	LICAT	ION 1	NO.		D.	ATE	
	2000								1	WO 1	L999-	EP85	61		1	9991	109
									BB.	BG.	BR,	BY.	CA.	CH.	CN.	CU.	CZ.
		•	•	•	•		•	•	•		GM,						
		•			- 2		•	-	-	-	LS,		-				
				•	•	•					SD,				-		
	•	•	•	•	•	•	•	•			ZW,		-			-	-
		•	TJ,		011,	,	٠2,	,	20,	J ,		,	,	,	,	,	,
	RW:				LS.	MW.	SD.	SL.	SZ.	TZ.	. UG.	ZW.	AT.	BE.	CH.	CY.	DE.
	RW: GH, GM, K DK, ES, F																
	CG, CI, CN				•	-	-		-	_	-			,	,	,	,
CA	2352				AA		•	•			L999-				1	9991	109
	9915						2001	0814		BR 1	L999-	1564	8	,	1	9991	109
	1144							EP 1999-968783						19991109			
	R:	AT.	BE.	CH.	DE.						IT,					MC.	PT.
					LV,			•	•	, ,	•	•	•	•		•	•
JP	2002						2002	1105		JP 2	2000-	5852	19		1	9991	109
							2003	0508		AU 2	2000-	2660	3		1	9991	109
TW	AU 760136 TW 473474						2002	0121		TW 1999-88120540					1	9991	124
	NO 2001002544									NO 2	2001-	2544			2	0010	523
	ZA 2001002544 ZA 2001005191										2001-					0010	622
	ORITY APPLN. INFO.:									US 1	1998-	1994	13	i		9981	
<b></b>										US 1	1999-	3987	83		A 1	9990	920
									,	WO 1	1999-	EP85	61	1	w 1	9991	109
murb e	OHDOR	101.			MAD	ייי ע כו	MADDAT 122.20 <i>67</i>										

OTHER SOURCE(S):

MARPAT 133:30670

AB The title compds. [I; R = H, NO2; R1 = Het, -HetSO2Ar, NO2, etc.; R2 = Ar, Het1, -Het1Ar, etc.; Ar = Ph, biphenyl, pyridyl, etc.; Het, Het1 = (un)substituted (un)saturated mono-, bi- or tricyclic 5-13 membered heterocyclyl], useful as glycoprotein IbIX antagonists (no data) for the control of thrombotic disorders, were prepared and formulated. E.g., preparation

of II was given. Compds. I are effective at 0.02-10 mg/kg/day.

IT 273741-19-8P 273741-20-1P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of substituted benzo[de]isoquinoline-1,3-diones as glycoprotein IbIX antagonists)

RN 273741-19-8 CAPLUS

CN Piperidine, 1-[[5-[6-[(3-aminopropyl)amino]-1,3-dioxo-1H-benz[de]isoquinolin-2(3H)-yl]-1-naphthalenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN

273741-20-1 CAPLUS
Piperidine, 1-[[5-[6-[(5-aminopentyl)amino]-1,3-dioxo-1H-benz[de]isoquinolin-2(3H)-yl]-1-naphthalenyl]sulfonyl]- (9CI) CN(CA INDEX

10/070,954

ANSWER 34 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2000:383680 CAPLUS

DOCUMENT NUMBER: 133:30729

TITLE: Preparation of derivatives of 2-(2-

oxoethylidene)imidazolidin-4-one and their use to

inhibit abnormal cell growth

Lyssikatos, Joseph Peter; Yang, Bingwei Vera INVENTOR(S):

PATENT ASSIGNEE(S): Pfizer Products Inc., USA SOURCE: Eur. Pat. Appl., 56 pp.

CODEN: EPXXDW

DOCUMENT TYPE: Patent LANGUAGE: English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PAT	ENT 1	NO.			KIN	D	DATE			APPLICATION NO.						ATE	
	EP	1006	 113			A1	_	2000	0607		EP	1999-	3094	 30		1	.9991	 125
		R:	AT,	BE,	CH,	DE,	DK,	, ES,	FR,	GB,	GR	, IT,	LI,	LU,	NL,	SE,	MC,	PT,
			ΙE,	SI,	LT,	LV,	FI,	, RO										
	JP	2000	1860'	75		A2		2000	0704	1	JP	1999-	3415	50		1	9991	201
	MΧ	9911	183			Α		2000	0731	]	MΧ	1999-	1118	3		1	9991	202
	BR	9905	788			A		2000	0829		BR	1999-	5788			1	9991	202
	US	6194	438			В1		2001	0227	1	US	1999-	4540	58		.1	9991	202
PRIOR	TT	APP	LN.	INFO	. :					1	US	1998-	1106	07P		P 1	9981	202
OTHER	THER SOURCE(S):				MAR	PAT	133:	30729	9									
GT																		

AB The title compds. I [R1, R2 = alkyl, alkenyl, arylalkyl, etc.; R3 = 1- or 2-adamantylalkyl, alkyl, arylalkyl, etc.; R4 = alkyl, aryl, heterocyclyl, etc.], inhibitors of abnormal cell growth (no data), were prepared E.g.,  $4-\{[1-(1\alpha,5\alpha,6\alpha-3-benzenesulfonyl-3-azabicyclo[3.1.0]hex-$ 6-yl)-5-oxo-4,4-bispyridin-4-ylmethylimidazolidin-2ylidene]acetyl}benzonitrile was prepared

IT 273206-23-8P 273206-30-7P 273206-31-8P

273206-32-9P 273206-63-6P

Ι

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of (oxoethylidene)imidazolidinones as inhibitors of abnormal cell growth)

RN 273206-23-8 CAPLUS

3-Azabicyclo[3.1.0]hexane, 6-[2-(4-cyanophenyl)-2-oxoethylidene]-5-oxo-CN 4,4-bis(4-pyridinylmethyl)-1-imidazolidinyl]-3-(1-piperidinylsulfonyl)-,  $(1\alpha, 5\alpha, 6\alpha)$  - (9CI) (CA INDEX NAME)

Relative stereochemistry. Double bond geometry unknown.

RN 273206-30-7 CAPLUS

CN 3-Azabicyclo[3.1.0]hexane,  $6-[2-[2-(4-\text{cyanophenyl})-2-\text{oxoethylidene}]-5-\text{oxo-}4,4-\text{bis}(4-\text{pyridinylmethyl})-1-\text{imidazolidinyl}]-3-[(4-\text{methyl}-1-\text{piperidinyl})\text{sulfonyl}]-, <math>(1\alpha,5\alpha,6\alpha)-(9\text{CI})$  (CA INDEX NAME)

Relative stereochemistry.

Double bond geometry unknown.

RN 273206-31-8 CAPLUS

CN 4-Piperidinecarboxylic acid,  $1-[[(1\alpha,5\alpha,6\alpha)-6-[2-[2-(4-cyanophenyl)-2-oxoethylidene]-5-oxo-4,4-bis(4-pyridinylmethyl)-1-imidazolidinyl]-3-azabicyclo[3.1.0]hex-3-yl]sulfonyl]-, ethyl ester (9CI) (CA INDEX NAME)$ 

Relative stereochemistry. Double bond geometry unknown.

RN 273206-32-9 CAPLUS

CN 3-Azabicyclo[3.1.0]hexane, 6-[2-[2-(4-cyanophenyl)-2-oxoethylidene]-5-oxo-4,4-bis(4-pyridinylmethyl)-1-imidazolidinyl]-3-[(4-propyl-1-piperidinyl)sulfonyl]-,  $(1\alpha, 5\alpha, 6\alpha)$ - (9CI) (CA INDEX NAME)

Relative stereochemistry.
Double bond geometry unknown.

RN 273206-63-6 CAPLUS

CN 3-Azabicyclo[3.1.0]hexane,  $6-[2-[2-(4-cyanophenyl)-2-oxoethylidene]-4,4-bis(1H-imidazol-4-ylmethyl)-5-oxo-1-imidazolidinyl]-3-[(4-methyl-1-piperidinyl)sulfonyl]-, <math>(1\alpha,5\alpha,6\alpha)-$  (9CI) (CA INDEX NAME)

Relative stereochemistry. Double bond geometry unknown.

10/070,954

ANSWER 35 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2000:157716 CAPLUS

DOCUMENT NUMBER: 132:194371

TITLE: Preparation of 4-(arylmethylene)-2,3-dihydropyrazol-3-

ones as neoplastic lesion inhibitors

INVENTOR(S): Pamukcu, Rifat; Piazza, Gary A.

PATENT ASSIGNEE(S): Cell Pathways, Inc., USA

SOURCE: U.S., 17 pp.
CODEN: USXXAM

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 6034099	Α	20000307	US 1998-200136	19981124
PRIORITY APPLN. INFO.:		•	US 1998-200136	19981124
OTHER SOURCE(S):	MARPAT	132:194371	•	
CT				

The title compds. (I) [wherein Rl = tetrazolyl, phosphonyl-substituted Ph AB or pyridyl, or (un) substituted benzyl, Ph, or alkoxybenzyl; R2 = alkyl, alkoxycarbonylalkyl, hydroxyalkyl, or hydroxycarbonylalkyl; R3 = H, (halo)alkyl, alkoxy, aminoalkanoyl, aminoalkyl, carbamoyl, or SO2NR4R5; R4 and R5 = independently H, alkyl, or NR4R5 together form an (un)substituted 5- or 6-membered ring optionally containing other N, S, or O heteroatoms] were prepd for the prevention and treatment of cancer. For example, cycloaddn. of p-nitrophenylhydrazine. HCl with ethylacetoacetate gave 5-methyl-2-(4-nitrophenyl)-2,4-dihydropyrazol-3-one (64%). Subsequent treatment of the pyrazolone with 2-ethylaniline in the presence of 1,3,5-triazine yielded the title compound II (83%). I are effective in modulating apoptosis and eliminating and inhibiting the growth of neoplasias, such as precancerous lesions, but are not characterized by the severe side reactions of conventional non-steroidal anti-inflammatory drugs (NSAIDs) or other chemotherapeutics (no data).

## IT 184708-23-4P 260256-31-3P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(target compound; preparation of 4-(arylmethylene)-2,3-dihydropyrazol-3-one neoplastic lesion inhibitors by reaction of 2,4-dihydropyrazol-3-ones with anilines in the presence of formaldehyde-donating groups)

RN 184708-23-4 CAPLUS

CN Piperidine, 1-[[4-[4-[[(2-ethoxyphenyl)amino]methylene]-4,5-dihydro-3-methyl-5-oxo-1H-pyrazol-1-yl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN 260256-31-3 CAPLUS

CN Piperidine, 1-[[4-[4-[(2-ethylphenyl)amino]methylene]-4,5-dihydro-3-methyl-5-oxo-1H-pyrazol-1-yl]phenyl]sulfonyl]-4-methyl- (9CI) (CA INDEX

REFERENCE COUNT:

99 THERE ARE 99 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L39 ANSWER 36 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2000:83115 CAPLUS

DOCUMENT NUMBER: 132:137392

TITLE: Preparation of azoles as Factor Xa inhibitors.

INVENTOR(S): Pinto, Donald Joseph Phillip; Pruitt, James Russell; Cacciola, Joseph; Fevig, John Matthew; Han, Qi; Orwat,

Michael James; Quan, Mimi Lifen; Rossi, Karen Anita

PATENT ASSIGNEE(S): Dupont Pharmaceuticals Co., USA

SOURCE: U.S., 152 pp. CODEN: USXXAM

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
		<del>-</del>		
US 6020357	Α	20000201	US 1997-995834	19971222
US 6548512	B1	20030415	US 2000-492708	20000127
PRIORITY APPLN. INFO.:			US 1996-33437P P	19961223
			US 1997-50304P P	19970620
. •		•	US 1997-995834 A3	19971222
OTHER SOURCE(S):	MARPAT	132:137392		

AB Title compds. [I; ring M contains, in addition to J, 0-3 N atoms; J = N, NH; D = CN, C(:NR8)NR7R9, C(O)NR7R8, etc.; E = (un)substituted Ph, pyridyl, pyrimidinyl, etc.; DEG = R-substituted pyridyl; R = H, halo, CF3, etc.; G = absent, NHCH2, OCH2, etc.; Z = C1-4 alkylene, (CH2)rO(CH2)r, etc.; R1a, R1b = absent, NMe, OMe, etc.; A = (un)substituted C3-10 carbocyclic residue, 5-10 membered heterocyclic containing from 1-4 heteroatoms selected from N, O, and S; B = (un) substituted C3-10 carbocyclic residue, 5-10 membered heterocyclic containing from 1-4 heteroatoms selected from N, O, and S, etc.; R7 = H, OH, C1-6 alkyl, etc.; R8, R9 = H, C1-6 alkyl, (CH2)nPh; n = 0-3; r = 0-3; s = 0-2; with provisos], useful as inhibitors of factors Xa, were prepared and formulated. Thus, treatment of 4-[o-(tert-BuSO2) phenyl] aniline with Me3Al/hexane in CH2C12 followed by the addition of Me 1-(3-cyanophenyl)imidazol-2-ylcarboxylate (preparation described), and the Pinner reaction of the resulting intermediate afforded 1-(3-amidinophenyl)-2-[(2'-aminosulfonyl-1,1'-biphen-4yl)aminocarbonyl]imidazole. Several I showed Ki ≤10 µM against Factor Xa and thrombin.

## IT 209955-87-3P 209955-88-4P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of azoles as Factor Xa inhibitors)

RN 209955-87-3 CAPLUS

CN 1H-Pyrazole-5-carboxamide, 1-[3-(aminoiminomethyl)phenyl]-3-methyl-N-[4-(1-

piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c} NH \\ \parallel \\ H_2N-C \\ \\ N \\ \\ C-NH \\ \\ \\ \end{array}$$

RN 209955-88-4 CAPLUS

CN 1H-Pyrazole-5-carboxamide, 1-[3-(aminoiminomethyl)phenyl]-3-methyl-N-[4-(1-piperidinylsulfonyl)phenyl]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 209955-87-3 CMF C23 H26 N6 O3 S

CM 2

CRN 76-05-1 CMF C2 H F3 O2

REFERENCE COUNT:

17 THERE ARE 17 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L39 ANSWER 37 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2000:53572 CAPLUS

DOCUMENT NUMBER:

132:93104

TITLE:

Preparation of sulfur substituted

sulfonylaminocarboxylic acid N-arylamides as

modulators of cyclic guanosine monophosphate (cGMP)

production

INVENTOR(S):

Schindler, Ursula; Schonafinger, Karl; Strobel,

Hartmut

PATENT ASSIGNEE(S):

Hoechst Marion Roussel Deutschland G.m.b.H., Germany

SOURCE: PCT Int. Appl., 87 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.						KIND DATE			APPLICATION NO.						DATE			
	WO	2000	0028	51		A1	<del></del> -	2000	0120		WO 1	999-:	EP44	26		1	9990	625	
		W:	AE,	AL,	AM,	AT,	ΑU,	AZ,	BA,	BB,	BG,	BR,	BY,	CA,	CH,	CN,	CU,	CZ,	
			DE,	DK,	EE,	ES,	FI,	GB,	GD,	GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	
			JP,	KE,	KG,	KΡ,	KR,	KZ,	LC,	LK,	LR,	LS,	LT,	LU,	LV,	MD,	MG,	MK,	
			MN,	MW,	MX,	NO,	ΝŻ,	PL,	PT,	.RO,	RU,	SD,	SE,	SG,	SI,	SK,	SL,	ТJ,	
			TM,	TR,	TT,	UA,	UG,	UZ,	VN,	YU,	ZA,	ZW,	AM,	AZ,	BY,	KG,	KZ,	MD,	
			RU,	ТJ,	TM														
		RW:	GH,	GM,	KE,	LS,	MW,	SD,	SL,	SZ,	UG,	ZW,	ΑT,	BE,	CH,	CY,	DE,	DK,	
			ES,	FI,	FR,	GB,	GR,	IE,	IT,	LU,	MC,	NL,	PT,	SE,	BF,	ВJ,	CF,	CG,	
			CI,					ML,											
	DE	1983	0430					2000											
	DE	1990	3126			A1		2000	0803		DE 1	999-	1990	3126		1	9990	127	
	CA	2336	807														9990	625	
	AU	9946	160			A1		2000	0201		AU 1	999-	4616	0		1	9990	625	
		7619				В2		2003											
	BR	9911	914			Α		2001	0327		BR 1	999-	1191	4		1	9990	625	
	EΡ	1095	016			A1		2001	0502		EP 1	999-	9293	18		1	9990	625	
			AT,					ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	PT,	ΙE,	FI
	JP	2002						2002						82					
	RU	2234	497			C2		2004	0820		RU 2	001-	1036	45		1	9990	625	
	NO 2001000013 A							2001	0301		NO 2	001-	13			2	0010	102	
PRIO	PRIORITY APPLN. INFO.:										DE 1	998-	1983	0430		A 1	9980	708	
														3126		A 1			
											wo 1	999-	EP44	26	1	W 1	9990	625	
OTHE!	R SO	DURCE	(S):			MAR:	PAT	132:	93104	4									

The title compds. [I; A1 = (un) substituted phenylene, naphthylene, AB heteroarylene; ring A2 comprises the carbon atoms which carry the groups C(:X)NH and NHSO2R2 is a benzene, naphthalene, (un)saturated 3-7 membered carbocycle, etc.; R1 = (un)substituted aryl, heterocyclyl, C1-18 alkyl; R2 = (un)substituted aryl, heterocyclyl, C1-10 alkyl, etc.; R3 = H, halo, CF3, etc.; n = 0-2; X = O, NH], useful for the therapy and prophylaxis of diseases, for example of cardiovascular diseases such as hypertension, angina pectoris, cardiac insufficiency, thromboses or atherosclerosis, were prepared The compds. I are capable of modulating the body's production of cyclic quanosine monophosphate (cGMP) and are generally suitable for the therapy and prophylaxis of diseases which are associated with a disturbed cGMP balance. Thus, reacting 4-{[2-(4-chlorophenylsulfonyl)-4,5dimethoxybenzoyl]amino}benzenesulfonyl fluoride (preparation given) with thiomorpholine afforded 65% II which showed 34.8-fold stimulation ([cGMP]test substance/[cGMP]control) at 50 μM.

([CGMP]test substance/[CGMP]control) at 254877-06-0P 254877-07-1P 254877-11-7P 254877-12-8P 254877-20-8P 254877-32-2P 254877-37-7P 254877-40-2P 254877-49-1P 254976-01-7P 254976-10-8P 254976-11-9P 254976-15-3P 254976-21-1P 254976-23-3P 254976-24-4P 254976-30-2P 254976-35-7P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of sulfur substituted sulfonylaminocarboxylic acid N-arylamides as modulators of cyclic guanosine monophosphate (cGMP) production)

RN 254877-06-0 CAPLUS

3-Pyridinecarboxamide, N-[4-[[4-(aminocarbonyl)-1-piperidinyl]sulfonyl]phenyl]-2-[[(4-chlorophenyl)sulfonyl]amino]- (9CI) (CA INDEX NAME)

CN

RN 254877-07-1 CAPLUS

CN 3-Pyridinecarboxamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN 254877-11-7 CAPLUS

CN Benzamide, 5-chloro-2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-[(4-hydroxy-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN 254877-12-8 CAPLUS

CN Benzamide, 5-chloro-2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-(1,4-dioxa-8-azaspiro[4.5]dec-8-ylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN 254877-20-8 CAPLUS

CN Benzamide, 5-chloro-2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN 254877-32-2 CAPLUS

CN Benzamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-[(4-hydroxy-1-piperidinyl)sulfonyl]phenyl]-4,5-dimethoxy- (9CI) (CA INDEX NAME)

RN 254877-37-7 CAPLUS

CN Benzamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-4,5-dimethoxy-N-[4-[(2-methyl-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN 254877-40-2 CAPLUS

CN Benzamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-4,5-dimethoxy-N-[4-[(4-methyl-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN 254877-49-1 CAPLUS

CN 4-Piperidinecarboxamide, 1-[[4-[[2-[[(4-chlorophenyl)sulfonyl]amino]-4,5-dimethoxybenzoyl]amino]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN 254976-01-7 CAPLUS

CN Benzamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-4,5-dimethoxy-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN 254976-10-8 CAPLUS

CN Benzamide, 5-chloro-2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-[(3,5-dimethyl-1-piperidinyl)sulfonyl]-3-methylphenyl]- (9CI) (CA INDEX NAME)

RN 254976-11-9 CAPLUS

CN Benzamide, 5-chloro-2-[[(4-chlorophenyl)sulfonyl]amino]-N-[3-methyl-4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN 254976-15-3 CAPLUS

CN Benzamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-[(3,5-dimethyl-1-piperidinyl)sulfonyl]phenyl]-4,5-dimethoxy- (9CI) (CA INDEX NAME)

RN 254976-21-1 CAPLUS

CN Benzamide, 2-[[(5-chloro-2-thienyl)sulfonyl]amino]-N-[4-[(3,4-dihydro-2(1H)-isoquinolinyl)sulfonyl]phenyl]-4,5-dimethoxy- (9CI) (CA INDEX NAME)

RN 254976-23-3 CAPLUS

CN Benzamide, 2-[[(5-chloro-2-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl)sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl]sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl]sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl]sulfonyl]sulfonyl]amino]-N-[4-[[(2R,6S)-2,6-thienyl]sulfon

dimethyl-1-piperidinyl]sulfonyl]phenyl]-4,5-dimethoxy-, rel- (9CI) (CA
INDEX NAME)

Relative stereochemistry.

RN 254976-24-4 CAPLUS

CN Benzamide, 5-chloro-N-[4-[(3,4-dihydro-2(1H)-isoquinolinyl)sulfonyl]phenyl ]-2-[[(3,5-dimethyl-4-isoxazolyl)sulfonyl]amino]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
N & O \\
N & Me
\end{array}$$

$$\begin{array}{c|c}
N & O \\
O & S & O
\end{array}$$

$$\begin{array}{c|c}
N & NH \\
O & NH
\end{array}$$

$$\begin{array}{c|c}
O & NH \\
O & NH
\end{array}$$

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C1 & O & O \\
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RN 254976-30-2 CAPLUS

CN 4-Piperidinecarboxamide, 1-[[4-[[2-[[(4-chlorophenyl)sulfonyl]amino]-4,5-difluorobenzoyl]amino]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & \\ & &$$

RN 254976-35-7 CAPLUS

CN Benzamide, 5-chloro-2-[[(3,5-dimethyl-4-isoxazolyl)sulfonyl]amino]-N-[4-[(3,5-dimethyl-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

2

REFERENCE COUNT:

THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L39 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2000:31524 CAPLUS

DOCUMENT NUMBER:

132:93102

TITLE:

Preparation of arylsulfonylaminoarylamides as

guanylate cyclase activators.

INVENTOR(S):

Schindler, Ursula; Schoenafinger, Karl; Strobel,

Hartmut

PATENT ASSIGNEE(S):

Hoechst Marion Roussel Deutschland G.m.b.H., Germany

SOURCE: Ger. Offen., 24 pp.

CODEN: GWXXBX

DOCUMENT TYPE:

Patent

LANGUAGE:

German

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

									APPLICATION NO.						DATE				
	DE	1983	0430			A1		2000	0113		DE 1	998-	1983	0430		1	9980	708	
		2336						2000						-		_			
	WO	2000						2000											
		W:						AZ,							-				
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			•	ТJ,															
		RW:	•	•		•		SD,		•				•	•	,		•	
								ΙE,						SE,	BF,	ВJ,	CF,	CG,	
			-					ML,	-										
	AU	9946	160			A1		2000			AU 1	999-	4616	0		1	9990	625	
	AU	7619	83			В2		2003											
		9911				A		2001											
	EΡ	1095				A1		2001											
								ES,	-	-	-	-	-	-	-	-			FI
		2001				Т2		2001		TR 2001-200100147 JP 2000-559082									
		2002		09		T2													
		2234				C2 B1		2004					1036				9990		
	-	6335						2002					3499						
		2000						2002											
		2001						2001		Ì	NO 2	001-	13	_		2			
•		2002				A1 20020523 US 2001-994730 A1 20040923 US 2004-816143									0011				
	US 2004186145							2004	0923								0040		
PRIOF	RIORITY APPLN. INFO.:									DE 1998-19830430							9980'		
										DE 1999-19903126						A 19990127			
									WO 1999-EP4426										
										us 1999-349933 us 2001-994730									
						1					US 2	001-	9947	30	1	A3 2	0011	128	
OTHER	OTHER SOURCE(S):						MARPAT 132:93102					.02							

GI

MARPAT 132:93102

 $R^3A^2$ NHSO2 $R^2$ I

AB Title compds. [I; Al = (substituted) phenylene, naphthylene, heteroarylene; A2 = atoms to form Ph, naphthyl, carbocyclyl, heterocyclyl rings; R1 = (substituted) aryl, heterocyclyl, alkyl; R2 = R1, amino; R3 = ≥1 of H, halo, CF3, OH, alkoxy, alkoxyalkoxy, aryloxy, NO2, cyano, amino, CO2H, etc.; X = O, NH, etc.; n = 0-2], were prepared Thus, 4-[[2-(4-chlorphenylsulfonylamino)-4,5-dimethoxybenzoyl]amino]benzenesulfo nyl fluoride was heated in thiomorpholine at 90° for 30 min. to give 65% 2-(4-chlorophenylsulfonylamino)-4,5-dimethoxy-N-[4-(thiomorpholin-4-sulfonyl)phenyl]benzamide. The latter at 50 μM gave 34.8-fold stimulation of soluble guanylate cyclase.

IT 254877-06-0P 254877-07-1P 254877-11-7P 254877-12-8P 254877-20-8P 254877-32-2P 254877-37-7P 254877-40-2P 254877-49-1P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of arylsulfonylaminoarylamides as guanylate cyclase activators) 254877-06-0 CAPLUS

RN 254877-06-0 CAPLUS
CN 3-Pyridinecarboxamide, N-[4-[[4-(aminocarbonyl)-1 piperidinyl]sulfonyl]phenyl]-2-[[(4-chlorophenyl)sulfonyl]amino]- (9CI)
 (CA INDEX NAME)

RN 254877-07-1 CAPLUS

CN 3-Pyridinecarboxamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN -254877-11-7 CAPLUS

CN Benzamide, 5-chloro-2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-[(4-hydroxy-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

HO NHC 
$$NHC$$
  $NHC$   $NHC$ 

RN 254877-12-8 CAPLUS

CN Benzamide, 5-chloro-2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-(1,4-dioxa-8-azaspiro[4.5]dec-8-ylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN 254877-20-8 CAPLUS

CN Benzamide, 5-chloro-2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-(1-

piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

RN 254877-32-2 CAPLUS

CN Benzamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-N-[4-[(4-hydroxy-1-piperidinyl)sulfonyl]phenyl]-4,5-dimethoxy- (9CI) (CA INDEX NAME)

RN 254877-37-7 CAPLUS

CN Benzamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-4,5-dimethoxy-N-[4-[(2-methyl-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN 254877-40-2 CAPLUS

CN Benzamide, 2-[[(4-chlorophenyl)sulfonyl]amino]-4,5-dimethoxy-N-[4-[(4-methyl-1-piperidinyl)sulfonyl]phenyl]- (9CI) (CA INDEX NAME)

RN 254877-49-1 CAPLUS

CN 4-Piperidinecarboxamide, 1-[[4-[[2-[[(4-chlorophenyl)sulfonyl]amino]-4,5-dimethoxybenzoyl]amino]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
 & O & O & O \\
 & NH-C & NH-C & OMe \\
 & NH-C & OMe \\
 & O & S=O \\
 & O & C1
\end{array}$$

109 ANSWER 39 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1999:652921 CAPLUS

DOCUMENT NUMBER: 132:18475

TITLE: Affinity and Selectivity of Matrix Metalloproteinase

Inhibitors: A Chemometrical Study from the Perspective

of Ligands and Proteins

AUTHOR(S): Matter, Hans; Schwab, Wilfried

CORPORATE SOURCE: Hoechst Marion Roussel Chemical Research, Frankfurt am

Main, D-65926, Germany

SOURCE: Journal of Medicinal Chemistry (1999), 42(22),

4506-4523

CODEN: JMCMAR; ISSN: 0022-2623

PUBLISHER: American Chemical Society

DOCUMENT TYPE: Journal LANGUAGE: English

A novel strategy to understand affinity and selectivity for enzyme inhibitors using information from ligands and target protein 3D structures is described. It was applied to 2-arylsulfonyl-1,2,3,4-tetrahydroisoquinoline-3-carboxylates and -hydroxamates as inhibitors of the matrix metalloproteinases MMP-3 (stromelysin-1) and MMP-8 (human neutrophil collagenase). As the first step, consistent and predictive 3D-QSAR models were derived using CoMFA, CoMSIA, and GRID/Golpe approaches, leading to the identification of binding regions where steric, electronic, or hydrophobic effects are important for affinity. These models were validated using multiple analyses using two or five randomly chosen cross-validation groups and randomizations of biol. activities. Second, 3D-QSAR models were derived based on the affinity ratio IC50(MMP-8)/IC50(MMP-3), allowing the identification of key ligand determinants for selectivity toward one of both enzymes. In addition to this ligands' view, the third step encompasses a chemometrical approach based on principal component anal. (PCA) of multivariate GRID descriptors to uncover the major differences between both protein binding sites with respect to their GRID probe interaction pattern. The resulting information, based on the accurate knowledge of the target protein 3D structures, led to a consistent picture in good agreement with exptl. observed differences in selectivity toward MMP-8 or MMP-3. The interpretation of all three classes of statistical models leads to detailed SAR information for MMP inhibitors, which is in agreement with available data for binding site topologies, ligand affinities, and selectivities. Thus the combined chemical analyses provide guidelines and accurate activity predictions for designing novel, selective MMP inhibitors.

### IT 236403-28-4 236403-41-1

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PRP (Properties); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(affinity and selectivity of matrix metalloproteinase inhibitors: chemometrical study from perspective of ligands and proteins)

RN 236403-28-4 CAPLUS

CN 3-Isoquinolinecarboxamide, 1,2,3,4-tetrahydro-N-hydroxy-2-[[3-[(2-hydroxybenzoyl)amino]phenyl]sulfonyl]-, (3R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 236403-41-1 CAPLUS

CN 3-Isoquinolinecarboxamide, 2-[[4-[(benzoylamino)methyl]-2-thienyl]sulfonyl]-1,2,3,4-tetrahydro-N-hydroxy-, (3R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

REFERENCE COUNT:

THERE ARE 41 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

9 ANSWER 40 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1999:454957 CAPLUS

DOCUMENT NUMBER: 131:228673

TITLE: Synthesis, reactions, and biological activity of some

new thieno[2,3-f]-1,3-benzodioxoles

AUTHOR(S): Bakhite, Etify A.; Radwan, S. M.

CORPORATE SOURCE: Chemistry Department, Faculty Science, Assiut Univ.,

Assiut, 71516, Egypt

SOURCE: Pharmazie (1999), 54(7), 491-498

CODEN: PHARAT; ISSN: 0031-7144

PUBLISHER: Govi-Verlag Pharmazeutischer Verlag

DOCUMENT TYPE: Journal LANGUAGE: English

OTHER SOURCE(S): CASREACT 131:228673

AB The reaction of 7-chlorothieno[2,3-f]-1,3-benzodioxole-6-carbonyl chloride (I) with aromatic or heterocyclic amines gave the corresponding 6-(aryl- or -hetaryl)carbamoyl-7-chlorothieno[2,3-f]-1,3-benzodioxoles. On reaction with KSCN, EtOH, or NaN3, I afforded the corresponding isothiocyanate, ester, and azide, resp. Hydrazinolysis of the ester gave the resp. hydrazide. These compds. were used as precursors in the synthesis of the target heterocycles, 6-substituted 7-chlorothieno[2,3-f]-1,3-benzodioxoles. Addnl., 2-methyl-1,3-dioxolo[5,6][1]benzothieno[2,3-c]quinolin-6(5H)-one was prepared The antibacterial and antifungal activities of selected compds. are reported.

IT 244093-20-7P

RL: SPN (Synthetic preparation); PREP (Preparation)

(preparation and antimicrobial activity of thienobenzodioxoles)

RN 244093-20-7 CAPLUS

CN Thieno[2,3-f]-1,3-benzodioxole-6-carboxamide, 7-chloro-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

REFERENCE COUNT:

THERE ARE 21 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

ANSWER 41 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1999:308109 CAPLUS

DOCUMENT NUMBER:

131:138914

TITLE:

Quantitative Structure-Activity Relationship of Human

Neutrophil Collagenase (MMP-8) Inhibitors Using Comparative Molecular Field Analysis and X-ray

Structure Analysis

AUTHOR (S):

Matter, Hans; Schwab, Wilfried; Barbier, Denis; Billen, Guenter; Haase, Burkhard; Neises, Bernhard; Schudok, Manfred; Thorwart, Werner; Schreuder, Herman; Brachvogel, Volker; Loenze, Petra; Weithmann, Klaus

Ulrich

CORPORATE SOURCE:

Chemical Research Core Research Functions, Hoechst Marion Roussel, Frankfurt am Main, D-65926, Germany

SOURCE:

Journal of Medicinal Chemistry (1999), 42(11),

1908-1920

CODEN: JMCMAR; ISSN: 0022-2623

PUBLISHER:

American Chemical Society

DOCUMENT TYPE:

Journal English

LANGUAGE: English
AB A set of 90 novel 2-(arylsulfonyl)-1,2,3

A set of 90 novel 2-(arylsulfonyl)-1,2,3,4-tetrahydroisoquinoline-3carboxylates and -hydroxamates as inhibitors of the matrix metalloproteinase human neutrophil collagenase (MMP-8) was designed, synthesized, and investigated by 3D-QSAR techniques (CoMFA, CoMSIA) and x-ray structure anal. Docking studies of a reference compound are based on crystal structures of MMP-8 complexed with peptidic inhibitors to propose a model of its bioactive conformation. This model was validated by a 1.7 Å x-ray structure of the catalytic domain of MMP-8. The 3D-QSAR models based on a superposition rule derived from these docking studies were validated using conventional and cross-validated r2 values using the leave-one-out method, repeated analyses using two randomly chosen cross-validation groups plus randomization of biol. activities. This led to consistent and highly predictive 3D-QSAR models with good correlation coeffs. for both CoMFA and CoMSIA, which were found to correspond to exptl. determined MMP-8 catalytic site topol. in terms of steric, electrostatic, and hydrophobic complementarity. Subsets selected as smaller training sets using 2D fingerprints and maximum dissimilarity methods resulted in 3D-QSAR models with remarkable correlation coeffs. and a high predictive power. This allowed to compensate the weaker zinc binding properties of carboxylates by introducing optimal fitting P1' residues. The final QSAR information agrees with all exptl. data for the binding topol. and thus provides clear guidelines and accurate activity predictions for novel MMP-8 inhibitors.

IT 236403-28-4 236403-41-1

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study)

(QSAR of (arylsulfonyl)tetrahydroisoquinoline carboxylates and -hydroxymates as human neutrophil collagenase (MMP-8) inhibitors)

RN 236403-28-4 CAPLUS

CN 3-Isoquinolinecarboxamide, 1,2,3,4-tetrahydro-N-hydroxy-2-[[3-[(2-hydroxybenzoyl)amino]phenyl]sulfonyl]-, (3R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

RN 236403-41-1 CAPLUS

CN 3-Isoquinolinecarboxamide, 2-[[4-[(benzoylamino)methyl]]-2-thienyl]sulfonyl]-1,2,3,4-tetrahydro-N-hydroxy-, (3R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

69

REFERENCE COUNT:

THERE ARE 69 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L39 ANSWER 42 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1998:785655 CAPLUS

DOCUMENT NUMBER: 130:25348

TITLE: Preparation of meta-substituted phenylenesulfonamide

derivatives as av \beta 3 integrin antagonists

INVENTOR(S): Chandrakumar, Nizal; Clare, Michael; Doubleday, Wendell; Gasiecki, Alan F.; Russell, Mark A.

PATENT ASSIGNEE(S): G.D. Searle and Co., USA SOURCE:

U.S., 24 pp. CODEN: USXXAM

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 5843906 US 6677308 PRIORITY APPLN. INFO.:	A B1	19981201 20040113	US 1997-824626 US 1998-141547 US 1996-14415P US 1997-824626	19970327 19980828 P 19960329 A3 19970327
OTHER SOURCE(S):	MARPAT	130:25348	03 1337 024020	A3 19970327

$$\begin{array}{c|c} H_2N & H & O \\ \hline \\ NH & NH & SO_2N \\ \hline \\ Ph & II \\ \end{array}$$

The present invention relates title compds. I [ B = CONR50, SO2NR50; A = AΒ NR5C(:Y1)NR7R8, NR5Y2:NR7; Y1 = NR2, O, S; Y2 = H, (un)substituted alkyl, cycloalkyl, bicycloalkyl, aryl, monocyclic heterocycle; R2 = H, OH, CN, NO2, (un) substituted alkyl, aryl, amino, alkenyl, alkynyl; R2R7 from 4-12-membered optionally fused ring; R7, R8 = independently H, (un) substituted alkyl, alkenyl, alkynyl, aralkyl, cycloalkyl, bicycloalkyl, aryl, acyl, benzoyl; Y2R7, R7R8 may from 4-12-membered monoor bicyclic ring; R5 = H, alkyl, alkenyl, alkynyl, PhCH2, PhCH2CH2; Z1, Z2, Z4, Z5 = independently H; alkyl, OH, alkoxy, aryloxy, aralkoxy, halo, haloalkyl haloalkoxy, NO2, amino, aminoalkyl, alkylamino, dialkylamino, CN, alkylthio, alkylsulfonyl, carboxyl derivs., acetamide, (fused) aryl,

Ι

cycloalkyl, thio, (fused) monocyclic heterocycle, group A; R50 = H, alkyl; R1 = H, (un)substituted alkyl, alkenyl, alkynyl, aryl; n = 0-2; R = XR3; X = 0, S, NR4; R3, R4 = independently H, (un)substituted alkyl, alkenyl, alkynyl, haloalkyl, aryl, arylalkyl, sugar residue, steroid residue; Y3, Z3 = independently H, alkyl, aryl, cycloalkyl, aralkyl] or a pharmaceutically acceptable salt thereof, pharmaceutical compns. comprising I, and methods of selectively inhibiting or antagonizing the  $\alpha\nu\beta3$  integrin. Thus, amidation of 3-H2NC6H4SO2NHCHPhCH2CO2Et (preparation given) with protected 3-guanidinobenzoic acid, followed by deprotection gave desired title compound II as its trifluoroacetate salt. II inhibited binding to human vitronectin receptor  $(\alpha\nu\beta3)$  and human fibrinogen receptor  $(\alpha IIb\beta3)$  with IC50 = 1.66 nM and 11.3 nM, resp.

# IT 197719-61-2P 216386-51-5P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of substituted phenylenesulfonamide derivs. as vitronectin and fibrinogen receptor antagonists)

RN 197719-61-2 CAPLUS

CN 2-Piperidineacetic acid, 1-[[3-[[3-[(aminoiminomethyl)amino]benzoyl]amino] phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & & & \\ & & & & \\ NH & & & & \\ NH & & & & \\ H_2N-C-NH & & & & \\ \end{array}$$

RN 216386-51-5 CAPLUS

CN 2-Piperidineacetic acid, 1-[[3-[[3-[(aminoiminomethyl)amino]benzoyl]amino] phenyl]sulfonyl]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 197719-61-2 CMF C21 H25 N5 O5 S

$$\begin{array}{c|c} & & & & & & \\ & & & & & \\ NH & & & & & \\ NH & & & & \\ NH & & & & \\ H_2N-C-NH & & & & \\ \end{array}$$

CM 2

CRN 76-05-1 CMF C2 H F3 O2

REFERENCE COUNT:

THERE ARE 10 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

AUTHOR(S):

ANSWER 43 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1998:487563 CAPLUS

DOCUMENT NUMBER: 129:230615

TITLE: Synthesis of isomeric 3-piperidinyl and 3-pyrrolidinyl

benzo[5,6]cyclohepta[1,2-b]pyridines: sulfonamido

derivatives as inhibitors of Ras prenylation Kelly, Joseph; Wolin, Ronald; Connolly, Michael; Afonso, Adriano; James, Linda; Kirshmeier, Paul;

Bishop, W. Robert; Mcphail, Andrew T.

CORPORATE SOURCE: Schering-Plough Research Institute, Kenilworth, NJ,

07033, USA

SOURCE: Bioorganic & Medicinal Chemistry (1998), 6(6), 673-686

CODEN: BMECEP; ISSN: 0968-0896

PUBLISHER: Elsevier Science Ltd.

DOCUMENT TYPE: Journal LANGUAGE: English

AB Blocking farnesylation of oncogenic Ras proteins is a mechanism-based therapeutic approach that is of current interest for the development of antitumor agents to treat Ras associated tumors. As part of a SAR study on the lead farnesyl protein transferase (FPT) inhibitor Sch 44342, the synthesis of novel geometric isomers and and the FPT inhibition activity of their N-acyl and N-sulfonamido derivs. is reported. The N-acyl derivs. are markedly less active than Sch 44342, thereby demonstrating that the spatial location of the N-acyl group in Sch 44342 is critical for binding of the compound to FPT. In contrast to Sch 44342, the N-sulfonamido series is a novel lead of nonsulfhydryl, nonpeptidic compds. that are dual FPT/GGPT inhibitors. In light of recent reports on the alternative prenylation of N- and K-Ras, dual FPT/GGPT inhibitors may be required to control cell proliferation in tumors containing activated Ras.

IT 183555-01-3P

CN

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)

(preparation of azacycloalkylbenzocycloheptapyridines as farnesyl protein transferase inhibitors)

RN 183555-01-3 CAPLUS

Benzamide, N-[[5-[[(3E)-3-(8-chloro-5,6-dihydro-11H-benzo[5,6]cyclohepta[1,2-b]pyridin-11-ylidene)-1-piperidinyl]sulfonyl] $_{72-thienyl]methyl]$ - (9CI) (CA INDEX NAME)

Double bond geometry as shown.

REFERENCE COUNT: 34 THERE ARE 34 CITED REFERENCES AVAILABLE FOR THIS

L39 ANSWER 44 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1998:479506 CAPLUS

DOCUMENT NUMBER: 129:109090

TITLE: Preparation of nitrogen-containing heteroaromatics as

factor Xa inhibitors

INVENTOR(S):, Pinto, Donald Joseph Phillip; Pruitt, James Russell;

Cacciola, Joseph; Fevig, John Matthew; Han, Qi; Orwat, Michael James; Quan, Mimi Lifen; Rossi, Karen Anita

PATENT ASSIGNEE(S): The Dupont Merck Pharmaceutical Co., USA

SOURCE:

PCT Int. Appl., 438 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

	PATENT NO.			KINI	D .	DATE			APPL	ICAT	ION 1	NO.		D	ATE ·				
	WO	9828	 269			A1	-	1998	0702		 WO 1	997-	US22	 895		1	9971	215	
		W:	AM,	AU,	ΑZ,	BR,	BY,	CA,	CN,	CZ,	EE,	ΗU,	IL,	JP,	KG,	KR,	ΚZ,	LT,	
			LV,	MD,	MX,	NO,	NZ,	PL,	RO,	RU,	SG,	SI,	SK,	ТJ,	TM,	UA,	VN,	AM,	
			ΑZ,	BY,	KG,	KZ,	MD,	RU,	ТJ,	TM									
		RW:	ΑT,	BE,	CH,	DE,	DK,	ES,	FI,	FR,	GB,	GR,	ΙE,	IT,	LU,	MC,	NL,	PT,	SE
	CA	2275	796			AA		1998	0702		CA 1	997-	2275	796		1	9971:	215	
		9856							0717		AU 1	998-	5602	0		1	9971:	215	
		7302																	
	EΡ	9465	80			A1		1999	1006		EP 1	997-	9524	09		1	9971:	215	
		R:	ΑT,	BE,	CH,			ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	PT,	ΙE,	FI
	EE	9900	316			Α			0215		EE 1	999-	316			1	9971	215	,
	SI	2001				С		2000	0229		SI 1	997-	2008:	2		1	9971	215	
· .	CN	1246	847			Α		2000	0308		CN 1	997-	1818	52		1	9971:	215	
	BR	9714							0509		BR 1	997-	1407	3		1	9971	215	
	JР	2001	5091	45		T2		2001	0710			998-							
	$z_{A}$	9711	586			Α		1999	0701		ZA 1	997-	1158	6		1	9971	223	
	TW	4929	71			В		2002	0701		TW 1	997-	8611	9637		1	9980:	203	
	ИО	9902	633			Α		1999	0820			999-							
	MΧ	9905	878			Α		2000	0131			999-							
	LT	4673				В		2000	0725		LT 1	999-	76			1	9990	622	
	LV	1243	0			В		2000	0720		LV 1	999- 996-	99			. 1	9990'	730	
PRIO	RITY	APP	LN.	INFO	.:						US 1	996-	7698	59	ž	A 1	9961	223	
											US 1	997-	8799	44	Ž	A 1	9970	620	
											WO 1	997-	US22	895	I	W 1	9971	215	
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IT

RN

The title compds. [I; ring M contains, in addition to J, 0-3 N atoms; J=N, NH; D = CN, C(:NR8)NR7R9, C(0)NR7R8, etc.; E = (un)substituted Ph, pyridyl, pyrimidinyl, etc.; DEG = R-substituted pyridyl; R = H, halo, CF3, etc.; G = absent, NHCH2, OCH2, etc.; Z = C1-4 alkylene, (CH2)rO(CH2)r, etc.; Rla, Rlb = absent, NMe, OMe, etc.; A = (un)substituted C3-10 carbocyclic residue, 5-10 membered heterocyclic containing from 1-4 heteroatoms selected from N, O, and S; B = (un) substituted C3-10 carbocyclic residue, 5-10 membered heterocyclic containing from 1-4 heteroatoms selected from N, O, and S, etc.; R7 = H, OH, C1-6 alkyl, etc.; R8, R9 = H, C1-6 alkyl, (CH2)nPh; n = 0-3; r = 0-3; s = 0-2], useful as inhibitors of factor Xa, were prepared and formulated. Thus, treatment of 4-[o-(tert-BuSO2)phenyl]aniline with Me3Al/hexane in CH2Cl2 followed by the addition of Me 1-(3-cyanophenyl)imidazol-2-ylcarboxylate (preparation described), and the Pinner reaction of the resulting intermediate afforded the title compound II. A number of compds. I were found to exhibit a Ki of ≤ 10 µM against factor Xa. Some compds. I were evaluated and found to exhibit Ki of  $< 10 \mu M$  against thrombin.

209955-87-3P 209955-88-4P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of nitrogen-containing heteroaroms. as factor Xa inhibitors) 209955-87-3 CAPLUS

CN 1H-Pyrazole-5-carboxamide, 1-[3-(aminoiminomethyl)phenyl]-3-methyl-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & \\ & & & \\ H_2N-C & & & \\ & & & \\ N & & & \\ & & & \\ N & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & &$$

RN 209955-88-4 CAPLUS

CN 1H-Pyrazole-5-carboxamide, 1-[3-(aminoiminomethyl)phenyl]-3-methyl-N-[4-(1-piperidinylsulfonyl)phenyl]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 209955-87-3 CMF C23 H26 N6 O3 S

$$\begin{array}{c} NH \\ \parallel \\ H_2N-C \\ \hline \\ N \\ C-NH \\ \hline \\ Me \\ \end{array}$$

CM 2

CRN 76-05-1 CMF C2 H F3 O2

REFERENCE COUNT:

12 THERE ARE 12 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

ANSWER 45 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

128:257447

ACCESSION NUMBER: DOCUMENT NUMBER:

1998:219795 CAPLUS

TITLE:

Preparation of nitrogenous heterocyclic compounds

inhibiting phosphorylation of platelet-derived growth

factors (PDGF) receptors

Matsuno, Kenji; Ichimura, Michio; Nomoto, Yuji; INVENTOR(S):

Fujiwara, Shigeki; Ide, Shinichi; Tsukuda, Eiji; Irie,

Junko; Oda, Shoji

PATENT ASSIGNEE(S):

Kyowa Hakko Kogyo Co., Ltd., Japan

PCT Int. Appl., 312 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

LANGUAGE:

SOURCE:

Patent Japanese

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PAT	CENT				KINI				i	APPL	ICAT	ION	NO.		I	DATE		
WO	9814							0409	1	wo 1	997-	 ЈР35	10		2	19971	001	
	W:	AU,	BG,	BR,	CA,	CN,	CZ,	HU,	JP,	KR,	MX,	NO,	NZ,	PL,	RO,	SG,	SI,	
					VN,													
	RW:	AT,	BE,	CH,	DE,	DK,	ES,	FI,	FR,	GB,	GR,	ΙE,	IT,	LU,	MC,	NL,	PT,	SE
CA	2239 9744	227			AA		1998	0409		CA 1	997-	2239	227			L9971	001	
AU	9744	708			A1		1998	0424		AU 1	997-	4470	8		-	L9971	001	
AU	7193	92			B2		2000	0511										
EP	8827	17			A1		1998	1209		EP 1	997-	9431	33			19971	001	
	R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE	, MC,	PT,	
		IE,	FI															
CN	1208	404			Α		1999	0217		CN 1	997-	1917	41			19971	001	
MX	1208 9804	356			Α		2000	0831	]	MX 1	998-	4356				19980	601	
	6169	088			В1		2001	0102	,	US 1	998-	8819	9			19980	601	
US	6207	667			В1		2001	0327		US 2	000-	4815	44		2	20000	112	
	2002						2002	0606		US 2	000-	7349	18		2	20001	.213	
	6472				В2		2002	1029										
US	2003	2290	77		A1		2003	1211		US 2	002-	2273	02		2	20020	826	
US	6750	218		,	B2		2004	0615										
RIORIT	Y APF	LN.	INFO	. :						JP 1	996-	2607	43		<b>A</b> :	19961	001	
								,		wo 1	997-	JP35	10		W :	19971	.001	
										US 2	000-	4815	44		A3 :	19980 20000	112	
											000-					20001		
THER S	OURCE	(S):			MARI	PAT	128:	2574	47									

GΙ

$$Q = -C - NHCH_2 - O$$

Nitrogenous heterocyclic compds. of general formula [I; wherein V is AΒ oxygen or sulfur; W is 1,4-piperazinediyl or 1,4-homopiperazinediyl which may be substituted with unsubstituted alkyl on the ring; X is nitrogen or C-R9; Y is nitrogen or C-R8; Z is nitrogen or C-R7, with at least one of X, Y and Z being nitrogen; Rl is hydrogen, substituted or unsubstituted alkyl, substituted or unsubstituted cycloalkyl or the like; R2 is substituted alkyl, substituted or unsubstituted cycloalkyl or the like; R3, R4, R5 and R6 are each independently hydrogen, halogeno, substituted or unsubstituted alkyl, nitro, cyano, (un) substituted OH or NH2 or the like; R7, R8 = R1, halogeno or the like; R9 is hydrogen or acyl] and pharmacol. acceptable salts thereof are prepared These compds. inhibit the phosphorylation of PDGF acceptors and the abnormal proliferation or migration of cells and so are effective in preventing or treating cell proliferative diseases such as arterial sclerosis, vascular reocclusion diseases, cancer, and glomerulosclerosis. Thus, 6,7-dimethoxy-4piperazinylquinazoline was dissolved in ethanol, followed by adding Ph isocyanate, and the resulting mixture was heated at reflux for 10 min to give 4(4-quinazolinyl) piperazine derivative (II; R = CONHPh). II (R = Q) in vitro showed IC50 of 0.03 μM for inhibiting the phosphorylation of PDGF receptor. Pharmaceutical formulations, e.g. tablet containing II (R = N-p-nitrophenylcarbamoyl), were prepared

IT 205257-01-8P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of nitrogenous heterocyclic compds. inhibiting phosphorylation of platelet-derived growth factors (PDGF) receptors)

RN 205257-01-8 CAPLUS

1-Piperazinecarbothioamide, 4-(6,7-dimethoxy-4-quinazolinyl)-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

CN

PAGE 1-A

PAGE 2-A



REFERENCE COUNT:

THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L39 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1997:679051 CAPLUS

DOCUMENT NUMBER: 127:318777

TITLE: Preparation of quanidinophenylsulfonylaminophenylsulfo

nylaminophenylpropanoates as  $\alpha v\beta 3$  integrin

inhibitors.

INVENTOR(S): Chandrakumar, Nizal; Clare, Michael; Doubleday,

Wendell; Gasiecki, Alan F.; Russell, Mark A.

PATENT ASSIGNEE(S): G.D. Searle and Co., USA; Chandrakumar, Nizal; Clare,

Michael; Doubleday, Wendell; Gasiecki, Alan F.;

Russell, Mark A.

SOURCE: PCT Int. Appl., 97 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

LANGUAGE:

Patent English

FAMILY ACC. NUM. COUNT: 2

PATENT INFORMATION:

PA	PATENT NO.				KIND DATE		APPLICATION NO.						DATE					
WO	9736	 861			A1	_				wo 1	997-	us39	86		1	9970:	320	
	W:	AL,	AM,	ΑT,	AU,	ΑZ	BA,	BB,	BG,	BR,	BY,	CA,	CH,	CN,	CU,	CZ,	DE,	
		DK,	EE,	ES,	FI,	GB,	GE,	GH,	HU,	IL,	IS,	JP,	ΚE,	KG,	KP,	KR,	ΚZ,	
		LC,	LK,	LR,	LS,	LT,	LU,	LV,	MD,	MG,	MK,	MN,	MW,	MX,	NO,	ΝZ,	PL,	
		PT,	RO,	RU,	SD,	SE,	SG,	SI,	SK,	ТJ,	TM,	TR,	TT,	UA,	UG,	US,	UZ,	
		VN,	YU,	AM,	ΑZ,	BY,	KG,	KZ,	MD,	RU,	ТJ,	TM						
	RW:	GH,	KE,	LS,	MW,	SD,	SZ,	UG,	AT,	BE,	CH,	DE,	DK,	ES,	FI,	FR,	GB,	
		GR,	IE,	IT,	LU,	MC,	NL,	PT,	SE,	BF,	ВJ,	CF,	CG,	CI,	CM,	GA,	GN,	
		ML,	-		SN,													
CA	2250	586			AA		1997	1009		CA 1	997-	2250	586		' 1	9970:	320	
AU	9724	208			<b>A</b> 1		1997	1022		AU 1	997-	2420	8		1	9970:	320	
EP	8898	76			<b>A</b> 1		1999	0113		EP 1	997-	9198	77		1:	9970:	320	
EP	8898	76			В1		2001	0725										
	R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	ΙT,	LI,	LU,	NL,	SE,	PT,	IE,	FI
JP	2000	5079	52		Т2		2000	0627		JP 1	997-	5352	78		1:	9970	320	
AT	2035	15			E		2001	0815		AT 1	997-	9198	77		1	9970:	320	
ES	2160	949			Т3		2001	1116		ES 1	.997-	9198	77		1:	9970:	320	
GR	3036	887			Т3		2002	0131		GR 2	2001-	4017	57		2	0011	016	
PRIORIT	Y APP	LN.	INFO	.:						US 1	996-	1441	5P		P 1	9960	329	
									,	wo 1	997-	US39	86	1	W 1:	9970	320	
OTHER S	OURCE	(S):			MAR	PAT	127:	3187	77									

$$A(CZ^3Y^3)_{m}$$
 $B$ 
 $SO_2NHCHR^1CH_2COR$ 
 $Z_1$ 
 $Z_2$ 
 $Z_4$ 
 $Z_5$ 

AB Title compds. [I; B = CONR50, SO2NR50; A = NR5C(Y1)NR7R8, NR5CY2(NR7); X = O, S, NR4; Y1 = NR2, O, S; R = XR3; Y2 = H, (substituted) alkyl, cycloalkyl bicycloalkyl, aryl, heterocyclyl, etc.; R1 = H, alkyl, alkenyl, alkynyl, (substituted) aryl; R2 = H, alkyl, aryl, OH, alkoxy, cyano, NO2, amino, alkenyl, alkynyl, etc.; Y2R7 = (substituted) heterocyclyl; R3, R4 = H, alkyl, alkenyl, alkynyl, haloalkyl, aryl, aralkyl, sugar residue,

Ι

GI

steroid residue; R5 = H, alkyl, alkenyl, alkynyl, PhCH2, PhCH2CH2; R7, R8 = H, (substituted) alkyl, alkenyl, alkynyl, aralkyl, cycloalkyl, bicycloalkyl, aryl, acyl, etc.; R2R7, R7R8 = (substituted) heterocyclyl; R50 = H, alkyl; Z1, Z2, Z3, Z4 = H, alkyl, OH, alkoxy, aryloxy, aralkoxy, halo, haloalkyl, haloalkoxy, NO2, amino, aminoalkyl, cyano, alkylthio, alkylsulfonyl, carboxyl derivs., (fused) aryl, cycloalkyl, (fused) heterocyclyl, etc.; Y3, Z3 = H, alkyl, aryl, cycloalkyl, aralkyl; m = 0-2], were prepared Thus,  $\beta$ -[[[3-[[3-[(aminoiminomethyl)amino]phenyl] carbonyl]amino]phenyl]sulfonyl]amino]benzenepropanoic acid trifluoroacetate (preparation given) inhibited  $\alpha v\beta 3$  integrin with IC50 = 1.66 nM.

IT 197719-62-3P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of guanidinophenylsulfonylaminophenylsulfonylaminophenylpropano ates as  $\alpha\nu\beta3$  integrin inhibitors)

RN 197719-62-3 CAPLUS

2-Piperidineacetic acid, 1-[[3-[[3-[(aminoiminomethyl)amino]benzoyl]amino]phenyl]sulfonyl]-, trifluoroacetate (5:7) (9CI) (CA INDEX NAME)

CM 1

CN

CRN 197719-61-2 CMF C21 H25 N5 O5 S

$$\begin{array}{c|c} & & & & & \\ & & & & \\ NH & & & \\ NH & & & & \\ NH & & & & \\ NH & & \\ NH & & \\ NH & & \\ NH & & & \\ NH & & & \\ NH & &$$

CM 2

CRN 76-05-1 CMF C2 H F3 O2

ANSWER 47 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1997:443319 CAPLUS

DOCUMENT NUMBER: 127:65701

Preparation of 2-arylsulfonylisoquinoline-3-carboxylic TITLE:

and hydroxamic acids and analogs as matrix

metalloproteinase inhibitors

Thorwart, Werner; Schwab, Wilfried; Schudok, Manfred; INVENTOR(S):

Haase, Burkhard; Bartnik, Eckart; Weithmann,

Klaus-ulrich

PATENT ASSIGNEE(S):

Hoechst Aktiengesellschaft, Germany

PCT Int. Appl., 70 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

SOURCE:

Patent German LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND DATE	APPLICATION NO.	DATE
WO 9718194	A1 19970522	WO 1996-EP4776	19961104
		HU, JP, KR, MX, NO, NZ,	
SG, SI, TF	, UA, US		
		FR, GB, GR, IE, IT, LU,	
DE 19542189	A1 19970515	DE 1995-19542189	19951113
DE 19612298	A1 19971002	DE 1996-19612298	19960328
AU 9675624	A1 19970605	AU 1996-75624	19961104
AU 707707	B2 19990715		•
EP 861236	A1 19980902	EP 1996-938052	19961104
	B1 20020213		
R: AT, BE, CH	, DE, DK, ES, FR,	GB, GR, IT, LI, LU, NL,	, SE, PT, IE, FI
JP 2000500145	T2 20000111	JP 1997-518542	19961104
RU 2164914	C2 20010410	JP 1997-518542 RU 1998-111153	19961104
RU 2164914 AT 213232	E 20020215	AT 1996-938052	
PL 186869	B1 20040331	PL 1996-326702	
BR 9611479	A 19990713	BR 1996-11479	19970312
us 6207672	B1 20010327		
US 2001011134			
us 6573277	B2 20030603		
us 2003176432			20030303
US 6815440	B2 20041109		
PRIORITY APPLN. INFO.:		DE 1995-19542189	A 19951113
		DE 1996-19612298	A 19960328
	,	WO 1996-EP4776	W 19961104
		US 1999-68497	A3 19990309
		US 2001-780514	
OTHER COURCE/C).	MADDAT 127.6570		

OTHER SOURCE(S):

MARPAT 127:65701

GI

Title compds. [I; R = CO2H or CONHOH; R1 = (un) substituted phenyl(alkyl), AΒ

CN

-naphthyl, etc.; R3R4 = (un)substituted CH:CHCH:CH, atoms to complete a heterocyclic ring, etc.; Z1,Z2 = (CH2)0-2] were prepared. Thus, Me (R)-1,2,3,4-tetrahydroisoquinoline-3-carboxylate was N-sulfonate by 4-(PhO)C6H4SO2CI and the product converted in 2 steps to title compound II (R = CONHOH). Data for biol. activity of I were given.

IT 191326-71-3P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of 2-arylsulfonylisoquinoline-3-carboxylic and hydroxamic acids and analogs as matrix metalloproteinase inhibitors)

RN 191326-71-3 CAPLUS

3-Isoquinolinecarboxamide, 1,2,3,4-tetrahydro-N-hydroxy-2-[[3-[(2-hydroxybenzoyl)amino]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

L39 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1997:383542 CAPLUS

DOCUMENT NUMBER: 127:4936

Preparation of 5-aminonaphthalene-1-sulfonamides TITLE: INVENTOR(S):

Butenas, Saulius; Nedospasov, Andrej; Palaima,

Algirdas; Staniulyte, Zita

Biochemijos Institutas, Lithuania PATENT ASSIGNEE(S):

Lith., 17 pp. SOURCE: CODEN: LIXXFS

DOCUMENT TYPE: Patent

LANGUAGE: Lithuanian

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
<del>_</del>				
LT 3911	В	19960425	LT 1993-1741	19931230
PRIORITY APPLN. INFO.:			LT 1993-1741	19931230
OTHER SOURCE(S):	CASREA	ACT 127:4936;	MARPAT 127:4936	
CT				

- The title compds. [I; R1, R2 = H, C1-8 alkyl, CH2CH2OH, etc.; NR1R2 = AB piperidino, morpholino, hexamethyleneimino], were prepared by reaction of the 5-phthalimidonaphthalenesulfonyl chloride with the corresponding amines in the presence of Et3N in Me2CO followed by treatment of the resulting 5-phthalimidonaphthalenesulfonamides with N2H4.H2O in MeOH.
- IT 176976-69-5P RL: IMF (Industrial manufacture); RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent) (preparation of 5-aminonaphthalene-1-sulfonamides)
- RN 176976-69-5 CAPLUS
- Piperidine, 1-[[5-(1,3-dihydro-1,3-dioxo-2H-isoindol-2-yl)-1-CN naphthalenyl]sulfonyl]- (9CI) (CA INDEX NAME)

ANSWER 49 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1997:77038 CAPLUS

DOCUMENT NUMBER: 126:89263

TITLE: Preparation of benzopyran-6-sulfonamides as potassium

channel opening agents.

INVENTOR(S): Manley, Paul W.

PATENT ASSIGNEE(S): Sandoz Ltd., Switz.; Sandoz-Patent-Gmbh;

Sandoz-Erfindungen Verwaltungsgesellschaft M.B.H.;

Manley, Paul W.

SOURCE: PCT Int. Appl., 45 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

LANGUAGE:

Patent English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PAT	ENT	NO.					DATE				LICAT				D	ATE	
WO	9637	490									1996-				1	9960	 524
	W:	AL,	AM,	AT,	AU,	AΖ	BB,	BG,	BR,	BY	, CA,	CH,	CN,	CZ,	DE,	DK,	EE,
		ES,	FI,	GB,	GE,	HU,	IS,	JP,	KE,	KG	, KP,	KR,	KZ,	LK,	LR,	LS,	LT,
		LU,	LV,	MD,	MG,	MK,	MN,	MW,	MX,	NO	, NZ,	PL,	PT,	RO,	RU,	SD,	SE,
		SG,	SI													,	• •
	RW:	KE,	LS,	MW,	SD,	SZ,	UG,	AT,	BE,	CH,	, DE,	DK,	ES,	FI,	FR,	GB,	GR,
		IE,	IT,	LU,	MC,	NL,	PT,	SE,	BF,	ВJ	, CF,	CG,	CI,	CM,	GA,	GN	
IL	1183 4216 2217 9660	82			A1		2000	0131		IL :	1996-	1183	82		1	9960	522
TW	4216	46	٠		В		2001	0211		TW :	1996-	8510	6034		1	9960	522
CA	2217	821			AA		1996	1128		CA :	1996-	2217	821		1	9960	524
AU	9660	800			A1		1996	1211		AU :	1996-	6000	8		1	9960	524
AU	7032	76			BZ		1999	0325							•		
ZA	9604	209			Α		1997	1124		ZA :	1996-	4209			1	9960	524
EP	8287	33			A1		1998	0318		EP :	1996-	9174	31		1	9960	524
EP	8287	33			В1		2001	0905									
	R:	ΑT,	ВÉ,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	, IT,	LI,	LU,	NL,	SE,	PT,	ΙE,
CN	1185						1998	0617		CN :	1996-	1941	46		1	9960	524
	1077				В		2002										
	9609				Α						1996-						
	1150										1996-						
ΝZ	3097	65			Α						1996-						
	2160				C2		2000	1220		RU :	1997-	1209	93		- 1	9960	524
	2052				E T3		2001	0915			1996-						
	2163				Т3		2002	_			1996-				1	9960	524
	8287				TP -					PT .	1996-	9174	31		1	9960	524
	1841				B1		2002				1996-				1	9960.	524
SK	2832	15			В6		2003			SK :	1997-	1577			1	9960	524
	9703						1997			FI :	1997-	3992			1	9971	017
US	5905				Α		1999	0518			1997-						
	9705				. A		1998				1997-						
HK	1014	137			A1		2002	0719		HK :	1998-	1132	16		1	9981	211
RITY	APP	LN.	INFO	.:							1995-				A 1	9950	524
										WO :	1996-1	EP22	57	1	W 1	9960	524
R SC	MRCE	181 .			MADE	тαс	126.	89261	2								

OTHER SOURCE(S):

MARPAT 126:89263

GI

AB Title compds., e.g., (I; R1 = aryl; R2 = H, alkyl, alkylene connected to R1; R3 = acylamino; R4 = H, R5 = OH; R4R5 = bond; R6-R8 = H, alkyl), were prepared Thus, 2-piperidone in THF was treated with LiN(SiMe3)2 and then with a THF solution of 1,2,3,4-tetrahydro-1-[(1a,7b-dihydro-2,2-dimethyl-2H-oxireno[c][1]benzopyran-6-yl)sulfonyl]quinoline (preparation given) and the mixture was heated at 80° for 17 h to give trans-1,2,3,4-tetrahydro-1-[[3,4-dihydro-2,2-dimethyl-3-hydroxy-4-(2-oxopiperidin-1-yl)-2H-1-benzopyran-6-yl]sulfonyl]quinoline. Title compds. at <1 μM gave 83-98% of maximal bronchorelaxant activity in cryopreserved human bronchi.

IT 185695-46-9P 185695-67-4P 185695-81-2P 185696-12-2P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of benzopyran-6-sulfonamides as potassium channel opening agents)

RN 185695-46-9 CAPLUS

CN Quinoline, 1-[[3,4-dihydro-3-hydroxy-2,2-dimethyl-4-(2-oxo-1-piperidinyl)-2H-1-benzopyran-6-yl]sulfonyl]-1,2,3,4-tetrahydro-, trans- (9CI) (CA INDEX NAME)

Relative stereochemistry.

RN 185695-67-4 CAPLUS

CN 3-Pyridinecarboxamide, N-[6-[(3,4-dihydro-1(2H)-quinolinyl)sulfonyl]-3,4-dihydro-3-hydroxy-2,2-dimethyl-2H-1-benzopyran-4-yl]-, trans- (9CI) (CA INDEX NAME)

Relative stereochemistry.

RN 185695-81-2 CAPLUS

CN 3-Pyridinecarboxamide, N-[6-[(3,4-dihydro-1(2H)-quinolinyl)sulfonyl]-3,4-dihydro-3-hydroxy-2,2-dimethyl-2H-1-benzopyran-4-yl]-, (3S-trans)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (-).

RN 185696-12-2 CAPLUS

CN 3-Pyridinecarboxamide, N-[6-[(3,4-dihydro-1(2H)-quinolinyl)sulfonyl]-3,4-dihydro-3-hydroxy-2,2-dimethyl-2H-1-benzopyran-4-yl]-, (3R-trans)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).

Page 173

ANSWER 50 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1997:14842 CAPLUS

DOCUMENT NUMBER: 126:59948

TITLE: Preparation of 4-(arylaminomethylene)-2,4-

dihydropyrazol-3-ones as selective inhibitors of cGMP

specific phosphodiesterase.

INVENTOR(S): Arlt, Michael; Jonas, Rochus; Christadler, Maria;

Schneider, Guenter; Klockow, Michael

PATENT ASSIGNEE(S): Merck Patent Gmbh, Germany

SOURCE: Eur. Pat. Appl., 26 pp.

CODEN: EPXXDW

DOCUMENT TYPE: Patent

LANGUAGE: German FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

	PAT	ENT	NO.			KIND	-	DATE			APE	PLICAT	ION :	NO.		Di	ATE	
		7433				A1		1996: 2003:			EP	1996-	1075	18		1	960	510
	EP	7433		DE		B1				CP	C.L	R, IE,	TT	тт	т т т	MT	рπ	c Fr
	DE	R:			CH,		υĸ,			GD,		1995-					950	
			8082			A1		1996										
		2354				E		2003				1996-					9960	
	PT	7433	304			${f T}$		2003				1996-						
	ES	2192	2588			т3		2003	1016		ES	1996-	1075	18		1:	9960	510
	AU	9652	2253			<b>A</b> 1		1996	1128		ΑU	1996-	5225	3		1:	9960.	513
	ΑU	7130	142			B2		1999	1125									
	CA	2176	649			AA		1996	1118		CA	1996-	2176	649		1	9960	515
	NO	9601	996			Α		1996	1118		NO	1996-	1996			1:	9960	515
	CN	1141	291			Α		1997	0129		CN	1996-	1074	53		1	9960	515
								2001	0523			•				•		
								1996	1125		ZA	1996-	3918			1:	9960	516
								1999	0209		US	1996-	6489	51		1	9960	516
											RU	1996-	1091	92		1	9960	516
											CZ	1996-	1421			1	9960	516
DDTOI						AZ		1990	1120									
				TMFO	• •			100			DE	1223-	TAOT	0002	•	w т	9930	JI I
	R SC	DURCE	s(S):			MARP.	ΑT	126:	59948	3								
GI																		
PRIOR OTHER GI	CN ZA US RÚ CZ PL JP	API	5138 3918 9516 9659 572 949 11035			A B A A C2 B6 B1 A2 MARP		2001 1996 1999 2002 2003 2003 1996	0523 1125 0209 0320 0416 0930 1126		ZA US RU CZ PL JP	1996-	3918 6489 1091 1421 3142 1464	51 92 86 46		1 1 1 1 1	9960 9960	516 516 516 516 516 517

AB Title compds. [I; R1 = PhCH2, alkoxybenzyl, (substituted) Ph, pyridyl; R2 = alkyl, alkoxycarbonyl, hydroxyalkyl, carboxyalkyl; R3 = H, alkyl, alkoxy, fluoroalkyl, chloroalkyl, aminoalkanoyl, aminoalkyl, carbamoyl, aminosulfonyl], were prepared as inhibitors of cGMP-specific phosphodiesterase (no data). Thus, p-nitrophenylhydrazine hydrochloride

RN

CN

and Et acetoacetate were refluxed in EtOH to give 5-methyl-2-(4-nitrophenyl)-2,4-dihydropyrazol-3-one. The latter was refluxed with 2-ethylaniline in EtOH to give 4-(2-ethylphenylaminomethylene)-5-methyl-2-(4-nitrophenyl)-2,4-dihydropyrazol-3-one.

IT 184708-23-4P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of 4-(arylaminomethylene)-2,4-dihydropyrazol-3-ones as selective inhibitors of cGMP specific phosphodiesterase)

184708-23-4 CAPLUS

Piperidine, 1-[[4-[4-[(2-ethoxyphenyl)amino]methylene]-4,5-dihydro-3-methyl-5-oxo-1H-pyrazol-1-yl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

ANSWER 51 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1996:708198 CAPLUS

DOCUMENT NUMBER:

125:317330

TITLE:

Tricyclic compounds useful for inhibition of G-protein function and for treatment of proliferative diseases Afonso, Adriano; Kelly, Joseph M.; Wolin, Ronald L.

INVENTOR(S): PATENT ASSIGNEE(S):

Schering Corporation, USA

SOURCE:

PCT Int. Appl., 65 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.															ATE			
WO	9630							1003								9960	320	
	W:	AL,	AM,	AU,	AZ,	BB,	BG,	BR,	BY,	CA,	CN,	CZ,	EE,	GE,	HU,	IS,	JP,	
								LV,										
	•	RU,	SG,	SI,	SK,	ТJ,	TM,	TR,	TT,	UA,	UZ,	VN,	AM,	ΑZ,	BY,	KG,	KZ,	
		MD,	RU															
	RW:	KE,	LS,	MW,	SD,	SZ,	UG,	ΑT,	BE,	CH,	DE,	DK,	ES,	FI,	FR,	GB,	GR,	
		IE,	IT,	LU,	MC,	NL,	PT,	SE,	BF,	ВJ,	CF,	CG,	CI,	CM,	GΑ,	GN,	ML,	
					TD,													
US	5684	013			" <b>A</b>		1997	1104		US 1	995-	4104	42		1	9950	324	
CA	2216	291					1996	1003		CA 1	996-	2216	291		1	9960	320	
CA	2216				С			0605										
	9653				A1			1016		AU 1	996-	5307	2		1	9960	320	
	7082							0729										
	8148							0107		EP 1	996-	9096	46		. 1	9960	320	
EP	8148				B1		2003											
																	IE,	FI
	1050				T2			0519		JP 1	996-	5294	29		1	9960	320	
	3001				B2			0124										
	4734							0121										
	2394						2003	0515		AT 1	996-	9096	46		1	9960	320	
	2198				Т3			0201										
	1176				A1			0128					03				1	
	5703				Α			1230					23					
	5958				Α		1999	0928					49					
RITY	APP	LN.	TNFO	.:									42			9950		
													17			9950		
										MO T	996-	US33	06	,	M T	9960	320	

OTHER SOURCE(S):

MARPAT 125:317330

$$R^{1}$$
 $R^{1}$ 
 $R^{2}$ 
 $R^{2}$ 
 $R^{2}$ 
 $R^{2}$ 
 $R^{2}$ 
 $R^{2}$ 
 $R^{2}$ 
 $R^{2}$ 

A method of inhibiting Ras function and therefore inhibiting cellular AB growth is disclosed. The method comprises the administration of I, II, or III [R, R1 = H, C1-6 alkyl, halo, OH, C1-6 alkoxy, NH2, C1-6 alkylamino, di((C1-6)alkyl)amino, CF3, SO3H, CO2R3, NO2, SO2NH2, CONHR4; R2 = R5C(O), R5CH2C(O), R5C(R6)2C(O), R5SO2, R5CH2SO2, R5SCH2C(O), R5OC(O), R5NHC(O), R5C(0)C(0), R4SC(0); R3 = C1-6 alkyl, aryl; R4 = C1-6 alkyl; R5 = C1-6alkyl, aryl, aryl(C1-6)alkyl, aryl(C2-6)alkenyl, heteroaryl, heteroaryl(C1-6)alkyl, heteroaryl(C2-6)alkenyl, heterocycloalkyl; R6 = C1-6 alkyl, or both R4 groups together with the C to which they are attached form a C3-7 carbocyclic ring; n = 0, 1; dotted line = optional double bond] or pharmaceutically acceptable salts thereof. Preparation of compds. of the invention, as well as of intermediates, is described. Inhibition of farnesyl protein transferase and of tumor cell growth by compds. of the invention was determined Active-compound tablet and capsule formulations are included.

III

# 183555-01-3P

IT

RN

CN

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(tricyclic compound preparation for use in Ras inhibition, inhibition of G-protein function, and treatment of proliferative diseases)

183555-01-3 CAPLUS

Benzamide, N-[[5-[[(3E)-3-(8-chloro-5,6-dihydro-11H-benzo[5,6]cyclohepta[1,2-b]pyridin-11-ylidene)-1-piperidinyl]sulfonyl]-2-thienyl]methyl]- (9CI) (CA INDEX NAME)

Double bond geometry as shown.

L39 ANSWER 52 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

1996:323169 CAPLUS

DOCUMENT NUMBER:

125:10613

TITLE:

N-Substituted 5-phthalimidonaphthalene-1-sulfonamides

as intermediates for preparation of N-substituted

aminonaphthalenesulfonamides

INVENTOR(S):

Nedospasov, A. A.; Palajma, A. I.; Butenas, S. Yu.;

Baranauskas, G. Yu.

PATENT ASSIGNEE(S):

Institut Biokhimii Litovskoj An, USSR

SOURCE:

U.S.S.R. From: Izobreteniya 1995, (28), 271.

CODEN: URXXAF

DOCUMENT TYPE:

Patent

LANGUAGE:

Russian

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
SU 1706174	A3	19951010	SU 1989-4648605	19890208
PRIORITY APPLN. INFO.:		,	SU 1989-4648605	19890208
GI				

Title compds. I [R1 = H, R2 = Me, Et, Bu, pentyl, octyl, cyclohexyl, AB 4-pyridinyl, CH2Ph; or NR1R2 = morpholino, NMe2, NEt2, NPr2, NBu2, piperidino] are disclosed as intermediates for preparation of N-substituted aminonaphthalenesulfonamides.

176976-69-5p, 1-[(5-Phthalimido-1-naphthyl)sulfonyl]piperidine ITRL: IMF (Industrial manufacture); RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent) (preparation of phthalimidonaphthalenesulfonamides as intermediates for aminonaphthalenesulfonamides)

176976-69-5 CAPLUS RN

Piperidine, 1-[[5-(1,3-dihydro-1,3-dioxo-2H-isoindol-2-yl)-1-CN naphthalenyl]sulfonyl]- (9CI) (CA INDEX NAME)

ANSWER 53 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1995:868620 CAPLUS

DOCUMENT NUMBER: 123:287002

TITLE: Synthesis and characterization of poly(amide

sulfonamide)s (PASAs)

AUTHOR(S): Chan, Winghong; Lam-Leung, Suei Yee; Ng, Chingfai;

Ding, Junqi; Xi, Shiping

CORPORATE SOURCE: Dep. Chem., Hong Kong Baptist Univ., Kowloon, Hong

Kong

SOURCE: Journal of Polymer Science, Part A: Polymer Chemistry

(1995), 33(15), 2525-31

CODEN: JPACEC; ISSN: 0887-624X

PUBLISHER: Wiley DOCUMENT TYPE: Journal

LANGUAGE: English

AB New diamino monomers were synthesized in a two-step reaction sequence starting from p-acetamidobenzenesulfonyl chloride. Solution polymerization of these

monomers in DMAC with terephthaloyl or isophthaloyl chloride resulted in the formation of a series of 14 poly(amide sulfonamide)s (PASAs) in excellent yield (>95%). The polymers have intrinsic viscosities of 0.32-1.11 dL g-1. Except for 2 polymers, all the other 12 other PASAs were readily soluble in aprotic polar solvents including DMAC, DMF, and DMSO. Thermogravimetric analyses of the polymers showed moderate thermal stability with 10% weight loss being recorded in the range of 325-408 °C. In addition, these polymers exhibit moderate chemical stabilities toward alkali, acidic, and chromic acid solution. The obtained polymers could be used for preparation for reverse osmosis membranes.

IT 163153-06-8P 163153-07-9P

RL: PRP (Properties); SPN (Synthetic preparation); PREP (Preparation) (synthesis and characterization of polyamide-polysulfonamides)

RN 163153-06-8 CAPLUS

CN Poly(1,4-piperidinediyl-1,3-propanediyl-4,1-piperidinediylsulfonyl-1,4-phenyleneiminocarbonyl-1,4-phenylenecarbonylimino-1,4-phenylenesulfonyl) (9CI) (CA INDEX NAME)

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PAGE 1-B

RN 163153-07-9 CAPLUS.

CN Poly(1,4-piperidinediyl-1,3-propanediyl-4,1-piperidinediylsulfonyl-1,4-phenyleneiminocarbonyl-1,3-phenylenecarbonylimino-1,4-phenylenesulfonyl)
(9CI) (CA INDEX NAME)

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PAGE 1-B

ANSWER 54 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1995:785009 CAPLUS

DOCUMENT NUMBER: 123:188601

TITLE: Antiarrhythmic 3-phenylsulfonyl-3,7-

diazabicyclo[3.3.1] nonanes

Schoen, Uwe; Farjam, Arman; Brueckner, Reinhard; INVENTOR(S):

Ziegler, Dieter

Kali-Chemie Pharma GmbH, Germany PATENT ASSIGNEE(S):

Eur. Pat. Appl., 20 pp. SOURCE:

CODEN: EPXXDW

DOCUMENT TYPE:

Patent German LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 665228	A1	19950802	EP 1995-100954	19950125
EP 665228	В1	19990714		
R: AT, BE, CH,	DE, DK	, ES, FR,	GB, GR, IE, IT, LI, LU,	NL, PT, SE
DE 4402931	Al	19950803	DE 1994-4402931	19940201
IL 112364	A1	19980104	IL 1995-112364	19950117
CN 1111631	Α	19951115	CN 1995-101498	19950125
AT 182149	E	19990715	AT 1995-100954	19950125
ES 2133593	Т3	19990916	ES 1995-100954	19950125
HU 70174	A2	19950928	ни 1995-262	19950127
CA 2141366	AA	19950802	CA 1995-2141366	19950130
AU 9511564	A1 -	19950810	AU 1995-11564	19950130
ZA 9500697	Α	19960207	ZA 1995-697	. 19950130
PL 180075	В1.	20001229	PL 1995-307000	19950130
FI 9500422	Α	19950802	FI 1995-422	19950131
NO 9500360	Α	19950802	NO 1995-360	19950131
JP 07267954	. A2	19951017	JP 1995-14204	19950131
US 5576327	Α	19961119	US 1995-382262	19950201
us 5635511	Α	19970603	us 1996-594946	19960131
PRIORITY APPLN. INFO.:			DE 1994-4402931	A 19940201
			US 1995-382262	A3 19950201
OTHER SOURCE(S).	MARPAT	123:18860	)1	

OTHER SOURCE(S):

MARPAT 123:188601

GT`

$$R^{1}N$$
  $R^{2}$   $N$   $SO_{2}$   $R^{4}$   $R^{5}$   $R^{5}$ 

The title compds. (I; R1 = C1-6 alkyl, C4-7 cycloalkylalkyl; R2, R3 =AB lower alkyl, or R2R3 = C3-6 alkylene; R4 = halo, NO2, CF3, CN, alkoxycarbonyl, alkanesulfonamido, carboxamido; R5 = H, halo) are useful for treatment of cardiac arrhythmia in humans and large mammals. Thus, I (R1 = Bu, R2 = R3 = Me, R4 = 4-CN, R5 = H) (II) (1  $\mu$ mol/kg i.v.) prolonged the effective refractory time by 15% in guinea pigs with exptl. tachycardia, and had a min. oral toxic dose >300 mg/kg in mice. II-HCl was prepared by condensation of 7-butyl-9,9-dimethyl-3,7diazabicyclo[3.3.1]nonane with 4-cyanobenzenesulfonyl chloride. Tablets were prepared containing II-HCl 20, corn starch 69, lactose 135, gelatin (as

10%

solution) 6, talc 5, and Mg stearate 5 mg.

IT 167552-74-1P 167552-98-9P 167553-00-6P 167553-02-8P 167553-03-9P 167553-05-1P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(antiarrhythmic phenylsulfonyldiazabicyclononanes)

RN 167552-74-1 CAPLUS

CN Benzamide, N-[4-[(7-butyl-9,9-dimethyl-3,7-diazabicyclo[3.3.1]non-3-yl)sulfonyl]phenyl]-4-cyano- (9CI) (CA INDEX NAME)

RN 167552-98-9 CAPLUS

CN Benzamide, N-[4-[(7-butyl-9,9-dimethyl-3,7-diazabicyclo[3.3.1]non-3-yl)sulfonyl]phenyl]-4-nitro-, (2R,3R)-2,3-dihydroxybutanedioate (1:1) (9CI) (CA INDEX NAME)

CM 1

CRN 167552-97-8 CMF C26 H34 N4 O5 S

CM 2

CRN 87-69-4 CMF C4 H6 O6

Absolute stereochemistry.

RN 167553-00-6 CAPLUS

CN Benzamide, N-[4-[(7-butyl-9,9-dimethyl-3,7-diazabicyclo[3.3.1]non-3-yl)sulfonyl]phenyl]-, (2R,3R)-2,3-dihydroxybutanedioate (1:1) (9CI) (CA INDEX NAME)

CM 1

CRN 167552-99-0 CMF C26 H35 N3 O3 S

CM 2

CRN 87-69-4 CMF C4 H6 O6

Absolute stereochemistry.

RN 167553-02-8 CAPLUS

CN Benzamide, N-[4-[(7-butyl-9,9-dimethyl-3,7-diazabicyclo[3.3.1]non-3-yl)sulfonyl]phenyl]-4-chloro-, (2R,3R)-2,3-dihydroxybutanedioate (9CI) (CA INDEX NAME)

CM 1

CRN 167553-01-7 CMF C26 H34 C1 N3 O3 S

CM 2

CRN 87-69-4 CMF C4 H6 O6

Absolute stereochemistry.

RN 167553-03-9 CAPLUS

CN Benzamide, 4-bromo-N-[4-[(7-butyl-9,9-dimethyl-3,7-diazabicyclo[3.3.1]non-3-yl)sulfonyl]phenyl]-, monohydrochloride (9CI) (CA INDEX NAME)

● HCl

RN 167553-05-1 CAPLUS

CN Benzamide, N-[4-[(7-butyl-9,9-dimethyl-3,7-diazabicyclo[3.3.1]non-3-yl)sulfonyl]phenyl]-4-(methylsulfonyl)-, (2R,3R)-2,3-dihydroxybutanedioate (9CI) (CA INDEX NAME)

CM 1

CRN 167553-04-0 CMF C27 H37 N3 O5 S2

CM 2

CRN 87-69-4 CMF C4 H6 O6

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Absolute stereochemistry.

9 ANSWER 55

ANSWER 55 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

1995:135690 CAPLUS

DOCUMENT NUMBER:

122:291651

TITLE:

Synthesis and characterization of sulfonamide)s

(PASAs)

AUTHOR(S):

Chan, Winghong; Lam-Leung, Suei Yee; Ng, Chingfai;

Ding, Junqi; Xi, Shiping

CORPORATE SOURCE:

Department Chemistry, Hong Kong Baptist College,

Kowloon, Hong Kong

SOURCE:

Polymeric Materials Science and Engineering (1993),

70, 32-3

CODEN: PMSEDG; ISSN: 0743-0515

DOCUMENT TYPE:

Journal

LANGUAGE:

English

AB Total 12 poly(amide sulfonamides) were synthesized by a low-temperature solution

polymerization  $\lq \mbox{The polymers}$  were characterized by viscosity measurements, solubility

tests, and TGA. Most of them are film forming polymeric materials with good potential for use as membrane material in reverse osmosis and pervaporation applications.

IT 163153-06-8P 163153-07-9P

RL: SPN (Synthetic preparation); PREP (Preparation) (synthesis and characterization of sulfonamides) for osmosis and pervaporation membranes)

RN 163153-06-8 CAPLUS

CN Poly(1,4-piperidinediyl-1,3-propanediyl-4,1-piperidinediylsulfonyl-1,4-phenyleneiminocarbonyl-1,4-phenylenecarbonylimino-1,4-phenylenesulfonyl)
(9CI) (CA INDEX NAME)

PAGE 1-A

PAGE 1-B

RN 163153-07-9 CAPLUS

CN Poly(1,4-piperidinediyl-1,3-propanediyl-4,1-piperidinediylsulfonyl-1,4-

phenyleneiminocarbonyl-1,3-phenylenecarbonylimino-1,4-phenylenesulfonyl)
(9CI) (CA INDEX NAME)

PAGE 1-A

PAGE 1-B

ANSWER 56 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

1994:134277 CAPLUS

DOCUMENT NUMBER:

120:134277

TITLE:

Preparation of tetrahydrophthalimide as herbicides

INVENTOR(S):

Akutagawa, Kunihiko; Yamada, Junji; Yoshikawa,

Harutoshi

PATENT ASSIGNEE(S):

Takeda Chemical Industries Ltd, Japan

SOURCE:

Jpn. Kokai Tokkyo Koho, 376 pp.

CODEN: JKXXAF

DOCUMENT TYPE:

Patent

LANGUAGE:

Japanese

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 05194386 PRIORITY APPLN. INFO.:	A2	19930803	JP 1992-251814 JP 1991-298604	19920807 19910809
OTHER SOURCE(S):	MARPAT	120:134277	/	

Title compds. I [R = (un)substituted sulfamoylphenyl] are prepared E.g., ABrefluxing a mixture of 4-chloro-5-(aminosulfonyl)aniline and 3,4,5,6-tetrahydrophthalic anhydride in HOAc for 1 h 30 min gave the title compound I [R = 4-chloro-3-sulfamoylphenyl]. I [R = 2-fluoro-4-chloro-5-(methylsulfamoyl)phenyl] (also prepared) at 10 g/are showed 100% kill against Ipomoea purpurea.

153091-70-4P 153091-71-5P 153091-77-1P IT RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as herbicide)

153091-70-4 CAPLUS RN

Piperidine, 1-[[2-chloro-4-fluoro-5-(1,3,4,5,6,7-hexahydro-1,3-dioxo-2H-CN isoindol-2-yl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

153091-71-5 CAPLUS RN

Piperidine, 1-[[2-bromo-4-fluoro-5-(1,3,4,5,6,7-hexahydro-1,3-dioxo-2H-CN isoindol-2-yl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN

153091-77-1 CAPLUS
Piperidine, 2-acetyl-1-[[2-bromo-4-fluoro-5-(1,3,4,5,6,7-hexahydro-1,3-dioxo-2H-isoindol-2-yl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME) CN

ANSWER 57 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

OCESSION NUMBER: 1994:134188 CAPLUS

DOCUMENT NUMBER: 120:134188

TITLE: Chlorosulfonation of N-arylmaleimides

AUTHOR(S): Tome, Augusto C.; Cavaleiro, Jose A. S.; Domingues,

Fernando M. J.; Cremlyn, Richard J.

CORPORATE SOURCE: Dep. Chem., Univ. Aveiro, Aveiro, 3800, Port. SOURCE: Phosphorus, Sulfur and Silicon and the Related

Elements (1993), 79(1-4), 187-94 CODEN: PSSLEC; ISSN: 1042-6507

DOCUMENT TYPE: Journal

LANGUAGE: Codelial English

GΙ

N-phenylmaleimides, o-, m- and p-substituted I (R = 2-, 3-, 4-MeO, 4-Me, R1 = H) reacted with excess chlorosulfonic acid to give the corresponding sulfonyl chlorides I (R1 = 3-, 5-, 6-SO2Cl). These were condensed with amines and phenols to give derivs. I (R1 = SO2X, X = NMe2, NHCHMe2, NHPh, piperidino, etc.; X = OAr, Ar = 3-, 4-O2NC6H4, 4-ClC6H4, C6Cl5) which underwent hydrolysis or ammonolysis to give resp. the sulfamoyl maleamic acids II (Y = OH) and sulfamoyl maleamides II (Y = NH2).

IT 152904-17-1P

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

RN 152904-17-1 CAPLUS

CN Piperidine, 1-[[5-(2,5-dihydro-2,5-dioxo-1H-pyrrol-1-yl)-2-methoxyphenyl]sulfonyl]- (9CI) (CA INDEX NAME)

ANSWER 58 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1994:8478 CAPLUS

DOCUMENT NUMBER: 120:8478

TITLE: Sulfonylbenzyl-substituted pyridones as angiotensin II

antagonists

INVENTOR(S): Hanko, Rudolf; Huebsch, Walter; Dressel, Juergen; Fey,

Peter; Kraemer, Thomas; Mueller, Ulrich E.;

Mueller-Gliemann, Matthias; Beuck, Martin; Kazda,

Stanislav; et al.

PATENT ASSIGNEE(S): SOURCE:

Bayer A.-G., Germany Eur. Pat. Appl., 33 pp.

CODEN: EPXXDW

DOCUMENT TYPE:

Patent

LANGUAGE:

German

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 557843	A2	19930901	EP 1993-102326	19930215
EP 557843	A3	19931201		
R: AT, BE, CH,	DE, DK	, ES, FR,	GB, GR, IE, IT, LI, L	U, MC, NL, PT, SE
DE 4206045	Al	19930902	DE 1992-4206045	19920227
US 5254543	Α	19931019	US 1993-19000	19930218
CA 2090267	AA	19930828	CA 1993-2090267	19930224
AU 9333770	Al	19930902	AU 1993-33770	19930224
AU 653288	B2 .	19940922		
JP 06041081	A2	19940215	JP 1993-61017	19930225
ZA 9301370	Α	19930323	ZA 1993-1370	19930226
HU 64057	A2	19931129	HU 1993-545	19930226
PRIORITY APPLN. INFO.:			DE 1992-4206045	A 19920227
OTHER SOURCE(S):	MARPAT	120:8478		
GI				

$$R^{2}$$
 $R^{3}$ 
 $R^{4}$ 
 $R^{5}$ 
 $R^{5$ 

AΒ Several title compds. I [R1 = (un) substituted alkyl, cycloalkyl; R2, R3, R4 = H, cyano, perfluoroalkyl, (un) substituted alkyl, acyl, alkoxycarbonyl, CO2CH2Ph, CO2H, (un) substituted Ph, CONR6R7; R5 = H, halo, alkyl, perfluoroalkyl, OX; R6, R7 = H, alkyl, aryl, aralkyl; X = H, CH2Ph, protecting group, alkyl; A = (un)substituted N-bound 3- to 8-membered saturated N-heterocyclyl containing 0-2 addnl. S, N, or O atoms] and salts were prepared as angiotensin II (A-II) antagonists, and particularly for treatment of arterial hypertension and atherosclerosis. Thus, N-alkylation of 6-butyl-4-(benzyloxycarbonyl)-2-oxo-1,2-dihydropyridine

CN

with  $(\pm)$ -4-(bromomethyl)-3-chlorobenzenesulfonic acid 2-(tert-butoxycarbonyl)piperidinide (prepns. given) using Cs2CO3 in MeOCH2CH2OMe, followed by deprotection, gave title compound  $(\pm)$ -II. The pyrrolidide analog of II, i.e. with A = 2-carboxypyrrolidino, inhibited A-II-induced contraction of isolated rabbit aorta dose-dependently with IC50 = 280 nM (no addnl. biol. data).

IT 151258-04-7 151258-05-8 151258-06-9 151258-10-5 151258-11-6 151258-12-7 151258-13-8 151258-15-0 151258-16-1 151258-17-2

RL: RCT (Reactant); RACT (Reactant or reagent) (preparation as angiotensin II antagonist)

RN 151258-04-7 CAPLUS

4-Pyridinecarboxylic acid, 6-butyl-1-[[2-chloro-4-[[2-[(1,1-dimethylethoxy)carbonyl]-1-piperidinyl]sulfonyl]phenyl]methyl]-1,2-dihydro-2-oxo-, phenylmethyl ester (9CI) (CA INDEX NAME)

RN 151258-05-8 CAPLUS

CN 4-Pyridinecarboxylic acid, 6-butyl-1-[[4-[(2-carboxy-1-piperidinyl)sulfonyl]-2-chlorophenyl]methyl]-1,2-dihydro-2-oxo-, 4-(phenylmethyl) ester (9CI) (CA INDEX NAME)

RN 151258-06-9 CAPLUS

CN 4-Pyridinecarboxylic acid, 6-butyl-1-[[4-[(2-carboxy-1-piperidinyl)sulfonyl]-2-chlorophenyl]methyl]-1,2-dihydro-2-oxo-(9CI) (CA INDEX NAME)

$$Bu-n$$
  $C1$   $Bu-n$   $Bu-n$ 

RN 151258-10-5 CAPLUS

CN 4-Pyridinecarboxylic acid, 1-[[4-[[2-[(1,1-dimethylethoxy)carbonyl]-1-piperidinyl]sulfonyl]phenyl]methyl]-1,2-dihydro-2-oxo-6-propyl-, methyl ester (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} O & & & & & & \\ \hline \\ O & & & & & \\ \hline \\ MeO-C & & & & \\ \hline \\ N-CH_2 & & & & \\ \hline \\ N-Pr & & & \\ \end{array}$$

RN 151258-11-6 CAPLUS

CN 4-Pyridinecarboxylic acid, 1-[[4-[(2-carboxy-1-piperidinyl)sulfonyl]phenyl]methyl]-1,2-dihydro-2-oxo-6-propyl-, 4-methyl ester (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
0 & & & & & & & & & & & & & \\
MeO-C & & & & & & & & & & & & \\
N-CH_2 & & & & & & & & & & \\
\end{array}$$

RN 151258-12-7 CAPLUS

CN 4-Pyridinecarboxylic acid, 6-butyl-1-[[4-[(2-carboxy-1-piperidinyl)sulfonyl]phenyl]methyl]-1,2-dihydro-2-oxo-, 4-methyl ester (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} O & & & & & & & & & & & & & \\ MeO-C & & & & & & & & & & & \\ & N-CH_2 & & & & & & & & \\ & & & & & & & & & \\ & & & & & & & & \\ \end{array}$$

RN 151258-13-8 CAPLUS

CN 4-Pyridinecarboxylic acid, 6-butyl-1-[[4-[(2-carboxy-1-piperidinyl)sulfonyl]phenyl]methyl]-1,2-dihydro-2-oxo-(9CI) (CA INDEX NAME)

RN 151258-15-0 CAPLUS

CN 4-Pyridinecarboxylic acid, 1-[[4-[(2-carboxy-1-piperidinyl)sulfonyl]phenyl]methyl]-1,2-dihydro-2-oxo-6-propyl-, disodium salt (9CI) (CA INDEX NAME)

●2 Na

RN 151258-16-1 CAPLUS

CN 4-Pyridinecarboxylic acid, 1-[[4-[(2-carboxy-1-piperidinyl)sulfonyl]phenyl]methyl]-1,2-dihydro-2-oxo-6-propyl-, 4-methyl ester, sodium salt (9CI) (CA INDEX NAME)

Na

RN 151258-17-2 CAPLUS

CN 4-Pyridinecarboxylic acid, 6-butyl-1-[[4-[(2-carboxy-1-piperidinyl)sulfonyl]phenyl]methyl]-1,2-dihydro-2-oxo-, 4-methyl ester, sodium salt (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} O & & & & & & & & & & & \\ MeO-C & & & & & & & & & \\ MeO-C & & & & & & & & \\ N-CH_2 & & & & & & & \\ \end{array}$$

● Na

L39 ANSWER 59 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1993:516913 CAPLUS

DOCUMENT NUMBER: 119:116913

TITLE: Synthesis of substituted 6-aminonaphthalene-1-

sulfamides

AUTHOR(S): Palaima, A.; Butenas, S.; Talaikyte, Z.

CORPORATE SOURCE: Inst. Biokhim., Lithuania SOURCE: Chemija (1991), (3), 144-53

CODEN: CHMJES; ISSN: 0235-7216

DOCUMENT TYPE: Journal LANGUAGE: Russian

OTHER SOURCE(S): CASREACT 119:116913

Ι

GΙ

AB Treating the amine group in 6-H2NC10H6SO3H or its Na or ammonium salts with phthalic anhydride in refluxing pyridine afforded directly the pyridinium salt of phthalimide derivative I (R = SO3-.HNC5H5+) in 63, 54, and 46% yields, resp. Subsequent reaction with PCl5 afforded I (R = SO2Cl), which upon reaction with amines afforded sulfamides I (R = SO2NR1R2; R1 = e.g., H, alkyl; R2 = alkyl; NR1R2 = e.g., morpholino). Deprotection was carried out by hydrazinolysis in MeOH, to afford 6-H2NC10H6SO2NR1R2 (II). The fluorescence of II suggested these compds. may be applied as fluorogenic groups for peptide substrates.

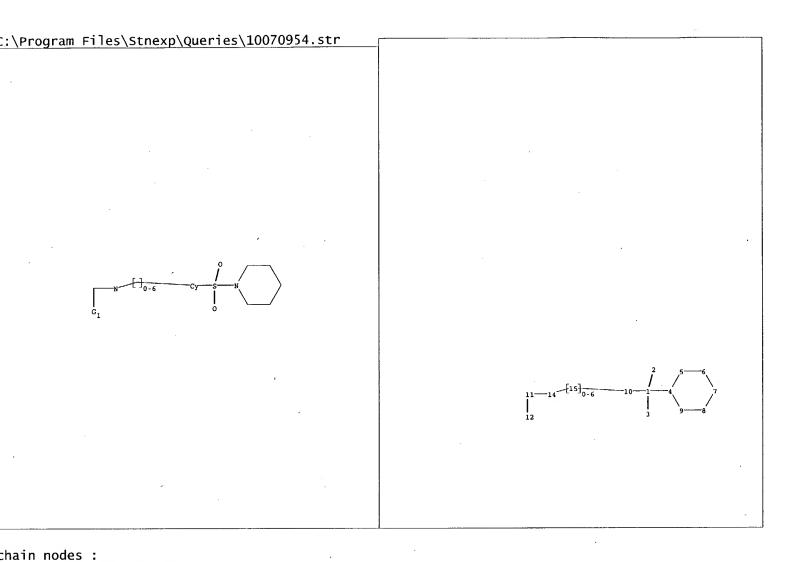
IT 145045-52-9P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(preparation and hydrazinolysis of)

RN 145045-52-9 CAPLUS

CN Piperidine, 1-[[6-(1,3-dihydro-1,3-dioxo-2H-isoindol-2-yl)-1-naphthalenyl]sulfonyl]- (9CI) (CA INDEX NAME)



```
1 2 3 10 12 15
ring nodes:
4 5 6 7 8 9
ring/chain nodes:
11 14
chain bonds:
1-2 1-3 1-4 1-10 10-15 11-12 14-15
ring/chain bonds:
11-14
ring bonds:
4-5 4-9 5-6 6-7 7-8 8-9
exact/norm bonds:
1-2 1-3 1-4 1-10 4-5 4-9 5-6 6-7 7-8 8-9 10-15 11-14 11-12 14-15
```

31:0,S

Natch level:
1:CLASS 2:CLASS 3:CLASS 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 11:CLASS 12:CLASS 14:CLASS 15:CLASS

L39 ANSWER 60 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

1993:34938 CAPLUS

DOCUMENT NUMBER:

118:34938

TITLE:

Substituted 6-aminoaphthalene-1-sulfamides as fluorogenic leaving groups of synthetic protease

substrates

AUTHOR(S):

Talaikyte, Z.; Butenas, S.; Palaima, A.

CORPORATE SOURCE:

Inst. Biochem., Vilnius, Lithuania

SOURCE:

Bioorganicheskaya Khimiya (1992), 18(6), 828-36

CODEN: BIKHD7; ISSN: 0132-3423

DOCUMENT TYPE:

Journal

LANGUAGE:

Russian

Alkyl substituted 6-aminonaphthalene-1-sulfamides (ANSA), hydrobromides of AB substituted 6-(Nα-benzyloxycarbonyl-L-arginyl)aminonaphthalene-1sulfamides (Z-Arg-ANSA) and hydrobromides of 6-(benzyloxycarbonylglycylglycyl-L-arginyl)aminonaphthalene-2-sulfamides (Z-Gly-Gly-Arg-ANSA) are synthesized and their absorption and emission spectra measured. ANSA have an emission band at 470-480 nm, comparable or exceeding in intensity that of compds. used as fluorogenic leaving groups in peptide cleavage reactions. The bands of Z-Arg-ANSA and Z-Gly-Gly-ANSA are shifted to the short-wave side and do not overlap with ANSA's emission Reactions of Z-Arg-ANSA and Z-Gly-Gly-Arg-ANSA with trypsin were studied. The kinetic parameters (kcat and Km) of the reaction of Z-Arg-ANSA were found to depend on the nature and the number of substituents in the sulfamide. In the case of Z-Gly-Gly-Arg-ANSA, this dependence is negligible and kcat/Km exceeds by over ten times this parameter of Z-Arg-ANSA. ANSA can apparently be used in the synthesis of fluorogenic substrates of proteases.

IT 145045-52-9P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(preparation and hydrazinolysis of)

145045-52-9 CAPLUS RN

Piperidine, 1-[[6-(1,3-dihydro-1,3-dioxo-2H-isoindol-2-yl)-1-CN naphthalenyl]sulfonyl]- (9CI) (CA INDEX NAME)

ANSWER 61 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

1991:81833 CAPLUS ACCESSION NUMBER:

DOCUMENT NUMBER: 114:81833

Preparation of 2,3-dihydro-1H-pyrrolo TITLE: [1,2-a]benzimidazole-6-sulfonamides

Kukalenko, S. S.; Frolov, S. I.; Lim, I. K. INVENTOR(S):

PATENT ASSIGNEE(S):

All-Union Scientific-Research Institute of Chemicals

for Plant Protection, USSR

U.S.S.R. From: Otkrytiya, Izobret. 1990, (31), 113. SOURCE:

CODEN: URXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Russian

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
	SU 1587052 RITY APPLN. INFO.:			20 2000 1110121	19880627 19880627
AB	morpholino; R1 = 2, prepared by heating	3-dihyd: 4,3-R2	ro-1H-pyrrol (O2N)C6H3SO2	2CHMe2)2, pyrrolidino, o[1,2-a]benzimidazol-6- NR2 (R2 = 2-pyrrolidino decomposition of the S	yl] were ) with SnCl2 in
deri	vative			•	

with aqueous NaOH.

IT 132028-54-7

RL: RCT (Reactant); RACT (Reactant or reagent) (reduction of, in preparation of pyrrolobenzimidazolesulfonamides)

132028-54-7 CAPLUS RN

Piperidine, 1-[[3-nitro-4-(2-oxo-1-pyrrolidinyl)phenyl]sulfonyl]- (9CI) CN (CA INDEX NAME)

$$\begin{array}{c|c}
 & \circ \\
 & \parallel \\
 & \parallel \\
 & \circ \\$$

10/970,954

9 ANSWER 62 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1990:612028 CAPLUS

DOCUMENT NUMBER: 113:212028

TITLE: Preparation of 8H-pyrido[4',3':4,5]thieno[3,2-

f][1,2,4]triazolo[4,3-a][1,4]diazepines as platelet

activating factor (PAF) inhibitors

INVENTOR(S): Okano, Kazuo; Miyazawa, Shuhei; Clark, Richard Stephen

John; Abe, Shinya; Kawahara, Tetsuya; Shimomura,

Naoyuki; Asano, Osamu; Yoshimura, Hiroyuki; Miyamoto,

Mitsuaki; et al.

PATENT ASSIGNEE(S):

. E

Eisai Co., Ltd., Japan Eur. Pat. Appl., 135 pp.

CODEN: EPXXDW

DOCUMENT TYPE:

Patent

LANGUAGE:

SOURCE:

English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	`KIND	DATE	APPLICATION NO.	DATE
EP 367110 EP 367110	A1 B1	19900509 19990811	EP 1989-119910	19891026
R: AT, BE	. CH, DE, ES B	FR, GB, 19951130	GR, IT, LI, LU, NL, SE FI 1989-4867	19891013
FI 95708	č	19960311		,
CA 2000985	AA	19900430	CA 1989-2000985	19891018
CA 2000985	С	20000118		
AU 8943761	A1	19900503	AU 1989-43761	19891026
AU 621413	B2	19920312		
EP 606103	A1	19940713	EP 1994-101416	19891026
EP 606103	B1	20030312		
			GR, IT, LI, LU, NL, SE	
EP 677524	A1.	19951018	EP 1995-111206	19891026
EP 677524	B1	20020213		
			GR, IT, LI, LU, NL, SE	10001006
AT 183187	E	19990815	AT 1989-119910	19891026
AT 213247	E	20020215		19891026
AT 234306	E	20030315		19891026 19891027
NO 8904287	A	19900502	NO 1989-4287	19891027
NO 175259 NO 175259	B	19940613 19940921		
JP 02256682	A2	19940921	JP 1989-281300	19891027
JP 2756004	B2	19980525		15051027
DK 8905406	A	19900501	DK 1989-5406	19891030
CN 1042356	A	19900523		19891030
CN 1042550	В	19950531	ON 1303 100230	25,00 200
HU 53106	A2	19900928	ни 1989-5609	19891030
HU 217127	В	19991129		
DD 293587	A5	19910905	DD 1989-334044	19891030
RU 2117670	C1	19980820	RU 1989-4742387	19891030
US 5382579	A	19950117	US 1991-751632	19910826
US 5221671	A	19930622	us 1991-778563	19911017
NO 9203459	A	19900502		19920904
US 5438045	A	19950801		19930427
US 5304553	Α	19940419		19930528
CN 1121076	Α	19960424		19940117
CN 1036520	В	19971126		
US 5409909	. A	19950425	us 1994-214850	19940318

US 5482937	A	19960109	US	1994-318971		19941006
US 5468740	. <b>A</b>	19951121	US	1995-386533		19950210
PRIORITY APPLN. IN	FO.:	,	JP	1988-275460	Α	19881031
. ,		•	JP	1988-297068	Α	19881124
		1	JΡ	1988-318016	·A	19881216
		,	JP	1988-331622	Α	19881228
		1	US	1989-421929	В2	19891016
			EΡ	1989-119910	<b>A3</b>	19891026
		1	NO	1989-4287	<b>A</b> 1	19891027
		1	US	1990-506928	В1	19900410
•		1	US	1991-751632	Α3	19910826
		1	US	1991-778563	A3	19911017
		1	US	1993-52721	A3	19930427
		1	US	1994-318971	А3	19941006

OTHER SOURCE(S):

MARPAT 113:212028

GI

AB Title compds. I (R1, R2 = H, alkyl; R3 = H, halo; R4 = H, alkyl; X = O2C, R5NCO, R5 = H, alkyl, R6OP(O)O, R6 = alkyl, SO2; n = 0, 1; Y = (un)substituted cycloalkyl, cycloalkylalkyl, alkynyl, alkylnitrilo, nitrilophenyl, heterocyclylalkyl, arylalkyl, arylalkenyl, cyclopropylalkenyl, etc.) are prepared as PAF inhibitors; I are useful in treatment of allergic and asthmatic diseases. 1-Cyano-1-methylethyl Ph carbonate and 6-(2-chlorophenyl)-11-methyl-2,3,4,5-tetrahydro-8H-pyrido[4',3':4,5]thieno[3,2-f][1,2,4]triazolo[4,3-a][1,4]diazepine in CHCl3 were heated at 120° for 1 h to give I (R1 = R2 = H; R3 = C1; R4 = Me; YXn = NCCMe2O2C) (II). In a PAF receptor binding assay to human platelet the IC5O for II was 0.0033 μM.

IT 130310-78-0P

RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of, as platelet activating factor inhibitor)

RN 130310-78-0 CAPLUS

CN 4H-Pyrido[4',3':4,5]thieno[3,2-f][1,2,4]triazolo[4,3-a][1,4]diazepine-9(8H)-carboxamide, 6-(2-chlorophenyl)-7,10-dihydro-1-methyl-N-[4-(1-piperidinylsulfonyl)phenyl]- (9CI) (CA INDEX NAME)

ANSWER 63 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1990:178264 CAPLUS

SOCUMENT NUMBER: 112:178264

TITLE: Chlorosulfonation of N-benzyl carboxamides

AUTHOR(S): Cremlyn, Richard; Ellis, Linda; Pinney, Anthony

CORPORATE SOURCE: Div. Chem. Sci., Hatfield Polytech.,

Hatfield/Hertfordshire, AL10 9AB, UK

Phosphorus, Sulfur and Silicon and the Related

Elements (1989), 44(3-4), 167-75

CODEN: PSSLEC; ISSN: 1042-6507

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 112:178264

GI

SOURCE:

c1—CONHCH<sub>2</sub>—So<sub>2</sub>C1

C1SO<sub>2</sub>

CONHCH<sub>2</sub>

SO<sub>2</sub>C1

II

AB N-Benzyl p-chloro- and 2,4-dichlorobenzamide reacted with chlorosulfonic acid to give the I (R = H, Cl) resp. On the other hand, N-benzylthiophene-2-carboxamide afforded the disulfonyl chloride II. The sulfonyl chlorides I and II were condensed with N-nucleophiles to give 22 derivs. The spectral data of the compds. are briefly discussed, together with the results of preliminary biol. screening against fungi, insects and weeds. Some where active against wheat rust and against downy mildew but were inactive against insects and weeds.

IT 126572-01-8P

RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation and fungicidal activity of)

RN 126572-01-8 CAPLUS

CN 2-Thiophenecarboxamide, 4-(1-piperidinylsulfonyl)-N-[[4-(1-piperidinylsulfonyl)phenyl]methyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c}
S & O \\
C - NH - CH_2 - O \\
O - S - O \\
O - O
\end{array}$$

L39 ANSWER 64 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

CORPORATE SOURCE:

1990:118396 CAPLUS

DOCUMENT NUMBER:

112:118396

TITLE:

Arylsulfonic acid derivatives. XVII. Synthesis of  $N-[\gamma-(N,N-disubstituted sulfamoylphenyl)alkyl]-4-$ 

alkoxybenzamides

AUTHOR(S):

Grigoryan, L. A.; Kaldrikyan, M. A.; Paronikyan, R. V.

Inst. Tonkoi Org. Khim., Yerevan, USSR

SOURCE:

Armyanskii Khimicheskii Zhurnal (1989), 42(4), 236-40

CODEN: AYKZAN; ISSN: 0515-9628

DOCUMENT TYPE:

LANGUAGE:

Journal Russian

CANGUAGE:
OTHER SOURCE(S):

CASREACT 112:118396

AB Chlorosulfonylation of 4-ROC6H4CONH(CH2)nPh (R = Et, Pr, Bu, n = 0, 1, 2) by ClO2SOH gave 4-ROC6H4CONH(CH2)nC6H4SO2Cl-4 which were amidated by NHR1R2 (NH3, piperidine, bis(2-chloroethyl)amine, Et2NH, morpholine) to give 20-40% 4-ROC6H4CONH(CH2)nC6H4SO2NR1R2-4. An alternative route from PhCH2CN, ClO2SOH, and piperidine followed by nitrile reduction and amidation by 4-BuOC6H4COCl gave 12% 4-BuOC6H4CONHCH2CH2C6H4SO2NR1R2-4 (NR1R2 = piperidino).

IT 125535-69-5P 125535-70-8P 125535-71-9P

125535-75-3P 125535-77-5P

RL: SPN (Synthetic preparation); PREP (Preparation)

(preparation of)

RN 125535-69-5 CAPLUS

CN Benzamide, 4-ethoxy-N-[[4-(1-piperidinylsulfonyl)phenyl]methyl]- (9CI) (CA INDEX NAME)

RN 125535-70-8 CAPLUS

CN Benzamide, N-[4-(1-piperidinylsulfonyl)phenyl]-4-propoxy- (9CI) (CA INDEX NAME)

RN 125535-71-9 CAPLUS

CN Benzamide, N-[[4-(1-piperidinylsulfonyl)phenyl]methyl]-4-propoxy- (9CI) (CA INDEX NAME)

RN 125535-75-3 CAPLUS

CN Benzamide, 4-butoxy-N-[[4-(1-piperidinylsulfonyl)phenyl]methyl]- (9CI) (CA INDEX NAME)

RN 125535-77-5 CAPLUS

CN Benzamide, 4-butoxy-N-[2-[4-(1-piperidinylsulfonyl)phenyl]ethyl]- (9CI) (CA INDEX NAME)

ANSWER 65 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACKESSION NUMBER: 1989:589437 CAPLUS

DOCUMENT NUMBER: 111:189437

TITLE: A comparison of positive ion and negative ion fast

atom bombardment mass spectral data for some sulfonyl

hydrazones and derivatives

AUTHOR(S): New, A. P.; Haskins, N. J.; Frearson, M. J.

CORPORATE SOURCE: SK and F Res. Ltd., Welwyn/Herts, AL6 9AR, UK

SOURCE: Biomedical & Environmental Mass Spectrometry (1989),

Volume Date 1988, 18(8), 620-3 CODEN: BEMSEN; ISSN: 0887-6134

DOCUMENT TYPE: Journal

LANGUAGE: English

AB A number of sulfonyl hydrazones and derivs. have been synthesized and tested for biol. activity as pesticides during the crop protection research program at the Hatfield Polytechnic. A comparative ionization study of some of these compds. using electron impact (EI), fast atom bombardment (FAB) and various chemical ionization methods showed FAB mass spectrometry to be the optimum technique to use in terms of mol. weight information obtained. FAB mass spectral data were compared in pos. and neg. ion mode using an alternating pos. and neg. ion detection system.

IT 123297-61-0

RL: PRP (Properties)

(mass spectra of, pos. ion and neg. ion fast atom bombardment, comparison of)

RN 123297-61-0 CAPLUS

CN 3-Thiophenecarboxamide, 5-(1-piperidinylsulfonyl)-N-[[4-(1-piperidinylsulfonyl)phenyl]methyl]- (9CI) (CA INDEX NAME)

9 ANSWER 66 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1988:5636 CAPLUS

DOCUMENT NUMBER: 108:5636

TITLE: Phthalimidobenzenesulfonyl derivatives

AUTHOR(S): Cremlyn, R. J.; Swinbourne, F. J.; Nunes, R. J.

CORPORATE SOURCE: Div. Chem. Sci., Hatfield Polytech., Hatfield/Herts.,

UK

Ι

SOURCE: Quimica Nova (1985), 8(1), 61-2

CODEN: QUNODK; ISSN: 0100-4042

DOCUMENT TYPE: Journal

LANGUAGE: English

N So<sub>2</sub>Cl

 $SO_2R^2$ 

AB Sulfonyl chlorides I (R1 = H, C1) were converted to the resp. sulfonamides II [R2 = NMe2, NHR3 (R3 = Ph, PhCH2, anisyl, ClC6H4, NH2, NMe2), NHN:CR4R5 (R4 = H and R5 = Ph, O2NC6H4, anisyl; R4 = R5 = Me; CR4R5 = cyclopentylidene), morpholino, N3, N:P(OEt)3]. II showed potential fungicidal activity.

IT 92082-91-2P

RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as fungicide)

RN 92082-91-2 CAPLUS

CN 3-Azatricyclo[3.2.1.02,4]octane, 3-[[4-(1,3-dihydro-1,3-dioxo-2H-isoindol-2-yl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

ANSWER 67 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

CCESSION NUMBER:

1987:549199 CAPLUS

DOCUMENT NUMBER:

107:149199

TITLE:

Synthesis of different types of chlorinated sulfonamides with expected insecticidal and

bactericidal activities

AUTHOR(S):

El-Sharief, A. A. S.; Mohamd, Y. A.; Ammar, Y. A.;

Hussin, M. E.; Zahran, M. A.

CORPORATE SOURCE:

Fac. Sci., Al-Azhar Univ., Nasr, Egypt

SOURCE:

Proceedings of the Indian National Science Academy, Part A: Physical Sciences (1987), 53(1), 179-88

CODEN: PIPSBD; ISSN: 0370-0046

DOCUMENT TYPE:

Journal English

LANGUAGE:

English

OTHER SOURCE(S):

CASREACT 107:149199

AB 2- And 4-chlorobenzoic acid-5-sulfonyl chlorides were reacted with various amines and with 2-mercaptobenzothiazole to give sulfonamides and thiosulfonic acid esters, resp. Interaction of sulfonamides with amines gave the sulfonamide derivs. of anthranilic and p-aminobenzoic acids, resp. Some of the chlorinated sulfonamides were combined with various groups (amide, ester, thioester, urea and thiocarbamate) to enhance their activities. Most of the chlorobenzoic sulfonamides were active against tested bacteria and fungi; 4-chlorobenzoic sulfonamides had especially high activity against Candida utilis. The activity of these compds. against Spodoptera littoralis was discussed.

IT 109030-27-5P 109051-11-8P

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

RN 109030-27-5 CAPLUS

CN 4-Morpholinecarboxamide, N-[4-chloro-3-(1-piperidinylsulfonyl)phenyl]-(9CI) (CA INDEX NAME)

RN 109051-11-8 CAPLUS

CN 1-Piperidinecarboxamide, N-[4-chloro-3-(1-piperidinylsulfonyl)phenyl]-(9CI) (CA INDEX NAME)

ANSWER 68 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1987:439312 CAPLUS

DOCUMENT NUMBER: 107:39312

TITLE: Synthesis of different types of chlorinated

sulfonamides with expected insecticidal and

antimicrobial activities

AUTHOR(S): Mohamed, Y. A.; Ammar, Y. A.; El-Sharief, A. A.;

Hussein, M. E.; Zahran, M. A.

CORPORATE SOURCE: Fac. Sci., Al-Azhar Univ., Nasr-City, Egypt

SOURCE: Acta Pharmaceutica Jugoslavica (1986), 36(3), 301-10

CODEN: APJUA8; ISSN: 0001-6667

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 107:39312

GI

$$C1$$
  $CO_2H$   $SO_2R$   $SO_2R$   $SO_2N$   $SO_2N$   $SO_2N$   $SO_2N$   $SO_2N$   $SO_2N$ 

AB Sulfonyl chlorides I and II (R = Cl) were treated with amines and with 2-mercaptobenzothiazole (R1SH) to give I and II (R = amino, R1S). Azides III and m-(N3CO)2C6H4 were also treated with amines and R1SH to give amides, thioesters, or ureas and thiocarbamates via Curtius rearrangement. Some I and II (R = amino) had min. inhibitory concns. against Candida utilis of 5  $\mu$ g/mL. Their bactericidal activity was poor and they were essentially devoid of insecticidal activity.

IT 109030-27-5P 109051-11-8P

RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of)

RN 109030-27-5 CAPLUS

CN 4-Morpholinecarboxamide, N-[4-chloro-3-(1-piperidinylsulfonyl)phenyl](9CI) (CA INDEX NAME)

RN 109051-11-8 CAPLUS

CN 1-Piperidinecarboxamide, N-[4-chloro-3-(1-piperidinylsulfonyl)phenyl]-(9CI) (CA INDEX NAME)

ANSWER 69 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1984:591758 CAPLUS

DOCUMENT NUMBER: 101:191758

TITLE: Thiazolidinone formation on thin-layer chromatoplates

AUTHOR(S): Youssef, M. S. K.; Hassan, K. M.; Atta, F. M.

CORPORATE SOURCE: Fac. Sci., Assiut Univ., Assiut, Egypt

SOURCE: Journal of the Indian Chemical Society (1983), 60(9),

885-6

CODEN: JICSAH; ISSN: 0019-4522

DOCUMENT TYPE: Journal LANGUAGE: English

OTHER SOURCE(S): CASREACT 101:191758

GI

AB Thiazolidine derivs. were prepared from azomethine compds. containing one or two

heterocyclic moieties. The reactions were performed on inert thin-layer chromatoplates under controlled conditions and the products of the reactions were compared with the expected substances on the same chromatogram. Thus, 2-thienyl-3-anilinothiazolidin-4-one (I) was formed by cyclocondensation of 2-thiophenecarboxaldehyde phenylhydrazone (II) with HSCH2CO2H on a silica gel coated plastic sheet.

IT 71333-40-9P

RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of)

RN 71333-40-9 CAPLUS

CN Piperidine, 1-[[4-(4-oxo-2-phenyl-3-thiazolidinyl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

#### IT71333-42-1P 71333-44-3P

RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of, by cyclocondensation of azomethine derivative with mercaptoacetic acid on thin-layer chromatoplate)

RN71333-42-1 CAPLUS

Piperidine, 1-[[4-[2-(4-chlorophenyl)-4-oxo-3-CNthiazolidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN

71333-44-3 CAPLUS
Piperidine, 1-[[4-[2-(4-nitrophenyl)-4-oxo-3-thiazolidinyl]phenyl]sulfonyl CN ]- (9CI) (CA INDEX NAME)

89 ANSWER 70 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1984:551705 CAPLUS

DOCUMENT NUMBER: 101:151705

TITLE: Derivatives of cinnamide-4-sulfonyl chloride and

p-(phthalimido)benzenesulfonyl chloride AUTHOR(S): Cremlyn, R. J.; Thandi, K.; Wilson, R.

Sch. Nat. Sci., Hatfield Polytech., Hatfield, UK Indian Journal of Chemistry, Section B: Organic Chemistry Including Medicinal Chemistry (1984),

23B(1), 94-6

CODEN: IJSBDB; ISSN: 0376-4699

DOCUMENT TYPE: Journal LANGUAGE: English

OTHER SOURCE(S): CASREACT 101:151705

GI

SOURCE:

GI

RSO<sub>2</sub>N III

CORPORATE SOURCE:

AB RH (R = H2NCOCH:CHC6H4-4, 4-phthalimidophenylene) reacted with C1SO3H to give RSO2Cl (I), which reacted with NaN3 to give RSO2N3 (II). PR13 (R1 = OEt, OPh, Ph) reacted with II to give RSO2N:PR13, whereas norbornene reacted with II to give aziridinenorbornanes III. I were treated with H2NNH2 to give RSO2NHNH2, which reacted with R2COR3 [R2 = R3 = Me; R2R3 = (CH2)5; R2 = H, R3 = Ph, C6H4NO2-4, C6H4OMe-4) to give hydrazones RSO2NHN:CR2R3. Amines HNR4R5 (R4 = R5 = Me, CH2CHMe2; R4 = H, R5 = CH2Ph; NR4R5 = morpholino, pyrrolidino, piperidino) and I gave sulfonamides RSO2NR4R5. RSO2N3 and RSO2NR4R5 (R4 = R5 = Me; NR4R5 = morpholino) were active against Escherichia coli and Staphylococcus aureus at 100 ppm. Several compds. were fungicides for Botrytis cinerea at 100 ppm.

IT 92082-91-2P

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

RN 92082-91-2 CAPLUS

CN 3-Azatricyclo[3.2.1.02,4]octane, 3-[[4-(1,3-dihydro-1,3-dioxo-2H-isoindol-2-yl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

ANSWER 71 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1984:510849 CAPLUS

DOCUMENT NUMBER: 101:110849

TITLE: Synthesis of potential plant protective agents and

pesticides from substituted anilines

AUTHOR(S): Kempter, Gerhard; Beerbalk, H. D.

Sekt. Chem./Biol., Paedagog. Hochsch. "Karl CORPORATE SOURCE:

Liebknecht", Potsdam-Sanssouci, DDR-1500, Ger. Dem.

Rep.

Wissenschaftliche Zeitschrift der Paedagogischen SOURCE:

Hochschule Karl Liebknecht Potsdam (1983), 27(1),

101-20

CODEN: WPKLAO; ISSN: 0138-290X

DOCUMENT TYPE:

Journal German

LANGUAGE: OTHER SOURCE(S):

CASREACT 101:110849

Anilines RZC6H4NH2 (R = heteroaryl, e.g., 6-chloro-3-pyridazinyl, Z = O, SO2) were prepared and converted into their corresponding ureas, carbamates, carboxamides, and benzenesulfonamides by treatment with isocyanates, chloroformates, and acyl halides, resp.

IT91620-24-5P

RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of)

RN91620-24-5 CAPLUS

Benzamide, N-[3-[(3,4-dihydro-1(2H)-quinolinyl)sulfonyl]phenyl]-3,5-CN dinitro- (9CI) (CA INDEX NAME)

L39 ANSWER 72 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1984:2

1984:209560 CAPLUS

DOCUMENT NUMBER:

100:209560

TITLE:

Synthesis and chemotherapeutic activity of new

p-sulfamoylbenzyl (phenethyl) amides of

benzofuran-2-carboxylic acid in staphylococcal

infection

AUTHOR(S):

Kaldrikyan, M. A.; Geboyan, V. A.; Ter-Zakharyan, Yu.

Z.; Paronikyan, R. V.

CORPORATE SOURCE:

Inst. Tonkoi Org. Khim., Yerevan, USSR

SOURCE:

Khimiko-Farmatsevticheskii Zhurnal (1984), 18(1),

58-61

CODEN: KHFZAN; ISSN: 0023-1134

DOCUMENT TYPE:

Journal

LANGUAGE:

Russian

OTHER SOURCE(S):

CASREACT 100:209560

GI

$$CONH - CH_2 - N$$
 $CONH - CH_2 - N$ 
 $CONH - CH_$ 

AB Reaction of 2-benzofurancarbonyl chloride with PhCH2NH2 or PhCH2CH2NH2, p-chlorosulfonation, and aminolysis of the sulfonyl chloride gave the sulfonamides I (R2N, n = NH2, 1,2; morpholino, 1,2; pyrrolidino, 1,2; Me2N, 2), which had bactericidal activity.

IT 90141-26-7P 90141-28-9P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)

(preparation and bactericidal activity of)

RN 90141-26-7 CAPLUS

CN 2-Benzofurancarboxamide, N-[[4-(1-piperidinylsulfonyl)phenyl]methyl](9CI) (CA INDEX NAME)

RN 90141-28-9 CAPLUS

CN 2-Benzofurancarboxamide, N-[2-[4-(1-piperidinylsulfonyl)phenyl]ethyl](9CI) (CA INDEX NAME)

9 ANSWER 73 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1984:209309 CAPLUS

DOCUMENT NUMBER: 100:209309

TITLE: Some novel sulfanilyl derivatives

AUTHOR(S): Cremlyn, R. J.; Swinbourne, F. J.; Batchelor, A.; Honeyman, R.; Nash, D.; Shode, O. O.; Patel, A.

CORPORATE SOURCE: Sch. Nat. Sci., Hatfield Polytech.,

Hatfield/Hertfordshire, UK

SOURCE: Indian Journal of Chemistry, Section B: Organic

Chemistry Including Medicinal Chemistry (1983),

22B(10), 1029-43

CODEN: IJSBDB; ISSN: 0376-4699

DOCUMENT TYPE: Journal LANGUAGE: English

OTHER SOURCE(S): CASREACT 100:209309

AB Benzoic acid anilide and p-chloro, m-nitro, together with the 2,4-, 2,5- and 3,4-dichloro derivs., reacted with chlorosulfonic acid (I) in 1:4 molar ratios to give the corresponding sulfanilyl chlorides. However, nicotinic acid and isonicotinic acid anilides reacted with I, in 1:6 molar ratios only for conversion into the sulfanilyl chlorides.

2,4-Dichlorophenoxyacetic acid anilide reacted with I in 1:3 molar ratios to give the sulfanilyl chloride; this reaction when carried out in 1:7 molar ratios of the reactants gave the disulfonyl chloride. The various sulfanilyl chlorides were treated with amines, azide ion, and hydrazine to give a range of sulfonyl compds. The compds. prepared have been subjected to preliminary biol. screening.

IT 89564-77-2P 89564-88-5P 89565-14-0P

RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of)

RN 89564-77-2 CAPLUS

CN Benzamide, N-[4-(3-azatricyclo[3.2.1.02,4]oct-3-ylsulfonyl)phenyl]-2,5-dichloro- (9CI) (CA INDEX NAME)

RN 89564-88-5 CAPLUS

CN Benzamide, N-[4-(3-azatricyclo[3.2.1.02,4]oct-3-ylsulfonyl)phenyl]-2,4-dichloro-(9CI) (CA INDEX NAME)

RN 89565-14-0 CAPLUS
CN Benzamide, N-[4-(3-azatricyclo[3.2.1.02,4]oct-3-ylsulfonyl)phenyl]- (9CI)
(CA INDEX NAME)

ANSWER 74 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1982:180887 CAPLUS

DOCUMENT NUMBER: 96:180887

Some sulfonyl derivatives of camphor, TITLE:

N-phenylsuccinimide, 2-aminophenol and substituted

benzoic acids

Cremlyn, Richard; Burrell, Keith; Fish, Kenneth; AUTHOR(S):

Hough, Ian; Mason, Donovan

Sch. Nat. Sci., Hatfield Polytech., Hatfield/Herts., CORPORATE SOURCE:

Phosphorus and Sulfur and the Related Elements (1982), SOURCE:

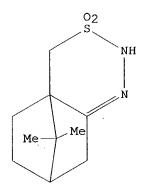
12(2), 197-204

CODEN: PREEDF; ISSN: 0308-664X

DOCUMENT TYPE:

Journal LANGUAGE:

English



Ι

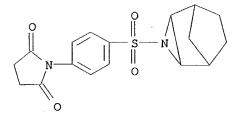
Camphor-10-sulfonyl chloride reacts with hydrazine to give the hydrazide; AΒ if the reaction is prolonged the benzothiadiazine dioxide (I) is obtained. p-Succinimidobenzenesulfonyl chloride with hydrazine (1 mol) gave the hydrazide, but with excess hydrazine the amide ring was opened to give the bis-hydrazide p-(CH2:NNHSO2)C6H4NHCO(CH2)2CONHN:CH2. Anisamide was converted to the chloride 2,5-(MeO)(H2NCO)C6H3SO2X (II; X = C1) and the amide II (X = NMe2), and the hydrazone II (X = NHN: CMe2). Reaction of the hydrazide with anisaldehyde gave the 4,4'-dimethoxybenzalazine. 2-Acetoxyacetanilide with chlorosulfonic acid afforded a mixture of 4-acetamido-3-hydroxy- and 3-acetamido-4-hydroxybenzenesulfonyl chlorides. Chlorosulfonylation of 4-acetoxyacetanilide gave the sulfonyl chloride, but with 3-acetoxyacetanilide no pure product was isolated.

IT 81592-96-3P

RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of)

81592-96-3 CAPLUS RN

3-Azatricyclo[3.2.1.02,4]octane, 3-[[4-(2,5-dioxo-1-CN pyrrolidinyl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)



39 ANSWER 75 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1981:406721 CAPLUS

DOCUMENT NUMBER: 95:6721

TITLE: Some sulfonyl derivatives of salicylic acid and

related compounds

AUTHOR(S): Cremlyn, Richard; Swinbourne, Frederick; Atherall,

John; Courtney, Lynn; Cronje, Theo; Davis, Paul;

Langston, Stuart; Rogers, Michael

CORPORATE SOURCE: Sch. Nat. Sci., Hatfield Polytech., Hatfield/Herts.,

UK

SOURCE: Phosphorus and Sulfur and the Related Elements (1980),

9(2), 155-64

CODEN: PREEDF; ISSN: 0308-664X

DOCUMENT TYPE:

Journal English

LANGUAGE:
OTHER SOURCE(S):

CASREACT 95:6721

o-Methoxybenzamide, salicylic acid, salicylamide and N-acetylsalicylamide were converted to the corresponding 5-sulfonyl chlorides, and p-hydroxybenzoic acid to the 3-sulfonyl chloride. The sulfonyl chlorides were characterized by the preparation of various derivs., e.g., amides, hydrazides, hydrazones and azides. Chlorosulfonation of O-acetyl compds. showed either complete or partial deacetylation. O-Acetyl compds. were therefore obtained by subsequent acetylation. O-Acetylsalicylamide on heating was isomerized to the N-acetyl derivative In contrast, both m- and p-acetoxybenzamides were relatively stable. Salicylanilide and O-methylsalicylanilide with chlorosulfonic acid gave the 1,4'-disulfonyl chlorides. On the other hand, 4'-chloro- and 4'-chloro-O-methylsalicylanilides afforded the corresponding monosulfonyl chlorides. The IR, NMR, and mass spectra, together with the algicidal and antibacterial results, are briefly discussed.

IT 77718-79-7P

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

RN 77718-79-7 CAPLUS

CN Benzamide, 5-[[1'-(4-chlorophenyl)[4,4'-bipiperidin]-1-yl]sulfonyl]-N-[4-[[1'-(4-chlorophenyl)[4,4'-bipiperidin]-1-yl]sulfonyl]phenyl]-2-hydroxy-(9CI) (CA INDEX NAME)

PAGE 1-A

PAGE 1-B

Page 225

ANSWER 76 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1980:446264 CAPLUS

DOCUMENT NUMBER: 93:46264

TITLE: β-Lactam formation on thin-layer chromatoplates

AUTHOR(S): Atta, F. M.; Youssef, M. S. K.; Hassan, K. M.

CORPORATE SOURCE: Fac. Sci., Assiut Univ., Assiut, Egypt

SOURCE: Indian Journal of Chemistry, Section B: Organic Chemistry Including Medicinal Chemistry (1979),

18B(5), 475-6

CODEN: IJSBDB; ISSN: 0376-4699

DOCUMENT TYPE: Journal LANGUAGE: English

Schiff bases containing 1 or 2 heterocyclic moieties were converted into the corresponding  $\beta$ -lactams by reaction with ClCH2COCl in the presence of Et3N on thin layer chromatoplates (silica gel) under controlled conditions. The products of the reactions were compared with the expected products on the same chromatogram. Thus, 1-(2-benzothiazoly1)-4-(2thienyl)-3-chloroazetidin-2-one was prepared from 2-(thenylidenamino)benzothiazole.

IT 71333-23-8P

> RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of)

RN

71333-23-8 CAPLUS Piperidine, 1-[[4-[3-chloro-2-(4-methoxyphenyl)-4-oxo-1-CN azetidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

💢 9 ANSWER 77 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

CORPORATE SOURCE:

1979:523662 CAPLUS

DOCUMENT NUMBER:

91:123662

TITLE:

Studies on  $\beta$ -lactams and thiazolidinones: Part

V. Synthesis and reactions of some new

p-arylidenesulfanilylpiperidines, -morpholines and

-piperazines

AUTHOR(S):

Hassan, K. M.; Atta, F. M.

SOURCE:

Fac. Sci., Univ. Assiut, Assiut, Egypt

Indian Journal of Chemistry, Section B: Organic Chemistry Including Medicinal Chemistry (1978),

16B(12), 1073-5

CODEN: IJSBDB; ISSN: 0376-4699

DOCUMENT TYPE:

Journal

LANGUAGE:

English

OTHER SOURCE(S):

CASREACT 91:123662

GΙ

$$R^1$$
 $N$ 
 $SO_2R$ 

$$SO_2R$$

$$\begin{bmatrix} R^1 & & & \\ & N & & \\ & & C1 & & \\ \end{bmatrix}$$

$$\begin{bmatrix} R^1 & & & \\ & & N & \\ & & & \\ S & & & \\ &$$

AB RSO2C6H4NH2-4 (R = piperidino, morpholino, piperazino) condensed with R1CHO (R1 = Ph, 2-HOC6H4, 4-ClC6H4, 4-O2NC6H4, 4-Me2NC6H4, 4-MeOC6H4, methylenedioxyphenyl) to give R1CH:NC6H4SO2R-4 (I), which underwent cyclocondensation with ClCH2COCl to give the lactams II. Cyclocondensation of I and HSCH2CO2H gave the thiazoles III. Analogous reactions of (4-H2NC6H4SO2)2X (X = 1,4-piperazinediyl) gave the bis(phenylsulfonyl)piperazines IV and V.

IT 71333-22-7P 71333-23-8P 71333-24-9P

71333-25-0P 71333-26-1P 71333-40-9P

II

71333-41-0P 71333-42-1P 71333-43-2P

71333-44-3P 71333-45-4P 71333-46-5P

71334-16-2P 71334-17-3P

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

RN 71333-22-7 CAPLUS

CN Piperidine, 1-[[4-[3-chloro-2-(4-chlorophenyl)-4-oxo-1-azetidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN 71333-23-8 CAPLUS
CN Piperidine, 1-[[4-[3-chloro-2-(4-methoxyphenyl)-4-oxo-1-azetidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN 71333-24-9 CAPLUS
CN Piperidine, 1-[[4-[3-chloro-2-(4-nitrophenyl)-4-oxo-1-azetidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN

71333-25-0 CAPLUS Piperidine, 1-[[4-[3-chloro-2-[4-(dimethylamino)phenyl]-4-oxo-1-azetidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)CN

RN71333-26-1 CAPLUS

Piperidine, 1-[[4-[2-(1,3-benzodioxol-5-yl)-3-chloro-4-oxo-1-CNazetidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN

71333-40-9 CAPLUS
Piperidine, 1-[[4-(4-oxo-2-phenyl-3-thiazolidinyl)phenyl]sulfonyl]- (9CI) CN (CA INDEX NAME)

71333-41-0 CAPLUS RN

Piperidine, 1-[[4-[2-(2-hydroxyphenyl)-4-oxo-3-CNthiazolidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN71333-42-1 CAPLUS

Piperidine, 1-[[4-[2-(4-chlorophenyl)-4-oxo-3-CN

thiazolidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN

71333-43-2 CAPLUS Piperidine, 1-[[4-[2-(4-methoxyphenyl)-4-oxo-3-CNthiazolidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

RN 71333-44-3 CAPLUS

Piperidine, 1-[[4-[2-(4-nitrophenyl)-4-oxo-3-thiazolidinyl]phenyl]sulfonyl CN]- (9CI) (CA INDEX NAME)

RN

71333-45-4 CAPLUS
Piperidine, 1-[[4-[2-[4-(dimethylamino)phenyl]-4-oxo-3-thiazolidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME) CN

RN71333-46-5 CAPLUS

Piperidine, 1-[[4-[2-(1,3-benzodioxol-5-yl)-4-oxo-3-thiazolidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME) CN

RN

71334-16-2 CAPLUS
Piperidine, 1-[[4-(3-chloro-2-oxo-4-phenyl-1-azetidinyl)phenyl]sulfonyl]-CN (9CI) (CA INDEX NAME)

RN

71334-17-3 CAPLUS Piperidine, 1-[[4-[3-chloro-2-(2-hydroxyphenyl)-4-oxo-1-CN azetidinyl]phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

139 ANSWER 78 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

1979:121763 CAPLUS

DOCUMENT NUMBER:

90:121763

TITLE:

Studies on ferrocene and its derivatives, VI.

Cyclocondensation reactions of some ferrocenyl anils

Hassan, K. M.

CORPORATE SOURCE:

SOURCE:

AUTHOR(S):

Fac. Sci., Assiut Univ., Assiut, Egypt

Zeitschrift fuer Naturforschung, Teil B: Anorganische

Chemie, Organische Chemie (1978), 33B(12), 1508-14

CODEN: ZNBAD2; ISSN: 0340-5087

DOCUMENT TYPE:

LANGUAGE:

Journal English

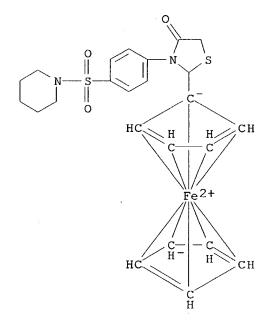
GΙ

- AB Condensation reaction of FcCHO (FC = ferrocenyl) with amines (e.g. 2-pyridinamine) gave the corresponding Schiff bases (e.g. I). Cyclocondensation reaction of the Schiff bases with ClCH2COCl or HSCH2CO2H gave ferrocenyl- $\beta$ -lactams (e.g. II) or ferrocenylthiazolidinones (e.g. III).
- IT 69228-94-0P 69229-03-4P
  PL: SPN (Synthetic preparat

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

- RN 69228-94-0 CAPLUS
- CN Ferrocene, [3-chloro-4-oxo-1-[4-(1-piperidinylsulfonyl)phenyl]-2-azetidinyl]- (9CI) (CA INDEX NAME)

RN 69229-03-4 CAPLUS
CN Ferrocene, [4-oxo-3-[4-(1-piperidinylsulfonyl)phenyl]-2-thiazolidinyl](9CI) (CA INDEX NAME)



L39 ANSWER 79 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1977:453188 CAPLUS

DOCUMENT NUMBER: 87:53188

TITLE: Synthesis of sulfonyl derivatives of

2-phenylphthalazine-1,4-dione

AUTHOR(S): Baloniak, Sylwester; Kryk, Wieslawa; Szuscicka,

Jadwiga

CORPORATE SOURCE: Inst. Chem. Anal., Sch. Med., Poznan, Pol.

SOURCE: Acta Poloniae Pharmaceutica (1976), 33(3), 329-34

CODEN: APPHAX; ISSN: 0001-6837

DOCUMENT TYPE: Journal

LANGUAGE: Polish

OTHER SOURCE(S): CASREACT 87:53188

GI

AB Chlorosulfonation of the title compound (I) at 110-20° yielded the sulfonyl chloride II (R = Cl), from which a series of sulfonamides (II, R = NH2, NMe2, 4-morpholinyl, 1-pyrrolidinyl, 1-piperidinyl, NHMe, NHEt, NEt2, NHPh, and 2-, 3-, and 4-pyridylamino) were prepared Chlorosulfonation of I at 0-5° yielded III, which treated with POCl3, Ac20, Me2SO4, and 80% NH2NH2.H2O gave IV (R = Cl, OAc, OMe, and NHNH2, resp.).

IT 63237-06-9P

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

RN 63237-06-9 CAPLUS

CN Piperidine, 1-[[4-(3,4-dihydro-1,4-dioxo-2(1H)-phthalazinyl)phenyl]sulfonyl]- (9CI) (CA INDEX NAME)

A9 ANSWER 80 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1976:44174 CAPLUS

DOCUMENT NUMBER: 84:44174

TITLE: Hexahydro(1,3,4-thiadiazol-2-yl)triazinone derivatives

INVENTOR(S): Rathgeb, Paul

PATENT ASSIGNEE(S): Ciba-Geigy A.-G., Switz.

SOURCE: Ger. Offen., 24 pp.

CODEN: GWXXBX

DOCUMENT TYPE:

Patent

LANGUAGE:

German

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
	DE 2514228	A1	19751016	DE 1975-2514228	19750401
	CH 588208	Α	19770531	CH 1974-4689	19740403
	NL 7503751	Α	19751007	NL 1975-3751	19750327
	FR 2266702	A1	19751031	FR 1975-10098	19750401
	US 4020065	Α	19770426	US 1975-564017	19750401
	CA 1065862	<b>A</b> 1	19791106	CA 1975-223489	19750401
	BE 827460	A1	19751002	BE 1975-155004	19750402
	JP 50135231	A2	19751027	JP 1975-40228	19750402
	ZA 7502078	Α	19760225	ZA 1975-2078	19750402
	GB 1498200	Α	19780118	GB 1975-13510	19750402
P	RIORITY APPLN. INFO.:			CH 1974-4689	A 19740403

GI For diagram(s), see printed CA Issue.

Thirty triazinones I [R = R1 = Me, Et; R = Me, R1 = Bu; NR1R2 = 1-pyrrolidinyl, morpholino, piperidino; R2 = Me, allyl, R3SCH2CH2 (R3 = Me, Et, CHMe2), MeO(CH2)3, CH2C.tplbond.CH, CMe3,, CHMe2, Bu, Et, Pr, (CH2)5Me, CH2Ph, pyrrolidinyl, (CH2)6Me, CHMeEt], useful as herbicides, were prepared by cyclizing thiadiazolylureas II with 2 equivalent HCHO and 1 equivalent amine R2NH2. Thus, II (R = R1 = Me), 35% formalin, and EtOH was treated within 5 min with 40% aqueous MeNH2; after the reaction moderated, the mixture was refluxed 30 min and worked up to give I. I (R-R2 = Me) killed >50% weeds without permanent damage to cotton and soybeans at 1 kg/hr in preemergence tests and similarly in postemergence tests, except that corn was also not permanently damaged.

## IT 57824-89-2P 57824-95-0P

RL: SPN (Synthetic preparation); PREP (Preparation)

(preparation of)

RN 57824-89-2 CAPLUS

CN Piperidine, 1-[[5-(tetrahydro-3,5-dimethyl-2-oxo-1,3,5-triazin-1(2H)-yl)-1,3,4-thiadiazol-2-yl]sulfonyl]- (9CI) (CA INDEX NAME)

RN 57824-95-0 CAPLUS

CN Piperidine, 1-[[5-(5-butyltetrahydro-3-methyl-2-oxo-1,3,5-triazin-1(2H)-yl)-1,3,4-thiadiazol-2-yl]sulfonyl]- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} N & O \\ \parallel & S \\ N & S \\ N & O \\ N & N \\ N & N \\ N & Me \\ \end{array}$$

IT

ACCESSION NUMBER: 1973:136188 CAPLUS

DOCUMENT NUMBER: 78:136188

TITLE: New class of sultones and related compounds

AUTHOR(S): Paull, Kenneth D.; Cheng, C. C.

CORPORATE SOURCE: Midwest Res. Inst., Kansas City, MO, USA

SOURCE: Journal of Heterocyclic Chemistry (1973), 10(1), 137-8

CODEN: JHTCAD; ISSN: 0022-152X

DOCUMENT TYPE: Journal LANGUAGE: English

AB The pyrrolidinone (I) was treated with concentrated H2SO4 and excess Ac2O to give the oxathiin (II, R = MeO)(III). II (R = H) was similarly prepared; III was treated with KOH to give the ester (IV). III was treated with PhCH2NH2 to give the sulfonamide (V). III and piperidine gave the imide

sulfonamide (VI).

RN 40633-51-0 CAPLUS

CN 2-Pyrrolidinone, 1-[[1,2,3,4-tetrahydro-6,7-dimethoxy-2-(1-piperidinylsulfonyl)-1-naphthalenyl]acetyl]-, didehydro deriv. (9CI) (CA INDEX NAME)

CM 1

CRN 48227-33-4 CMF C23 H32 N2 O6 S

9 ANSWER 82 OF 82 CAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1963:436081 CAPLUS

DOCUMENT NUMBER: 59:36081
ORIGINAL REFERENCE NO.: 59:6556e-h

TITLE: Anthraquinone azo dyes INVENTOR(S): Bergstrom, Herman A.

PATENT ASSIGNEE(S): General Aniline & Film Corp.

SOURCE: 5 pp.
DOCUMENT TYPE: Patent
LANGUAGE: Unavailable

PATENT INFORMATION:

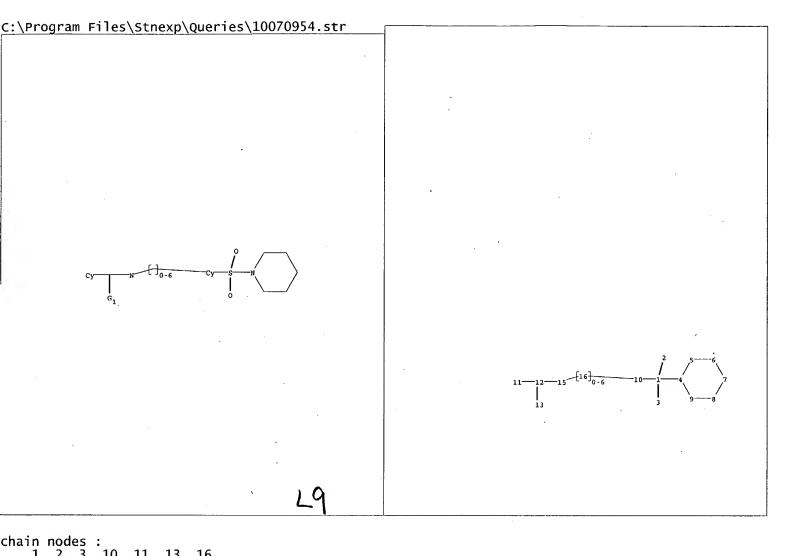
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 3079376	•	19630226	US	19570215

GI For diagram(s), see printed CA Issue.

AΒ Pigments of high light fastness are obtained by diazotizing leuco sulfuric esters of 2-amino-anthraquinones, coupling with 3-hydroxy-2naphthanilides, and oxidizing the product to give I. Thus, 42.9 parts of the di-Na salt of 2-aminoanthraquinone 9,10-dihydrodisulfuric acid ester (II) is diazotized, coupled with 33.4 parts 4'-(butylcarbamoyl)-3-hydroxy-2-naphthanilide (III) and the product hydrolyzed and oxidized by heating in 1500 parts H2O with 13 parts 31.5% aqueous NaNO2 and 95 parts 20° Be. HCl for 0.5-1 hr. at 70-90° to give I(V = W = X = Z = H, Y = CONMe2), a red pigment. Similarly, other I are prepared (V, W, X, Y, Z, and color given): 3-C1, H, H, CONHCHMe2, H, red; 3-C1, H. H, H, CONHPh, red; 3-C1, Me, H, SO2R (R = piperidino), H, orange; 1-C1, Me, H, H, SO2R, red; 3-Cl, H, H, COR, H, red; H, H, H, H, CONHCHMe2, H, red; 6-Cl, H, H, CONHC6H11, H,; 3-Cl, Cl, H, SO2NMe2, H, -; 3-Cl, OMe, H, H, CONMe2; 3-Cl, H, NO2, CONH2, H,; 3-Cl, H, H, CONMe2, H, -. Similarly, the 1-amino isomer of II and the 4-CONHBu analog of III gave a red pigment. The 3-Cl derivative of II was also coupled with 8-hydroxy-4'-(isopropylcarbamoyl)-1naphthanilide.

RN 106170-93-8 CAPLUS

CN 2-Naphtho-o-toluidide, 4-[(2-chloro-1-anthraquinonyl)azo]-3-hydroxy-4'-(piperidinosulfonyl)- (7CI) (CA INDEX NAME)



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chain nodes:
    1 2 3 10 11 13 16

ring nodes:
    4 5 6 7 8 9

ring/chain nodes:
    12 15

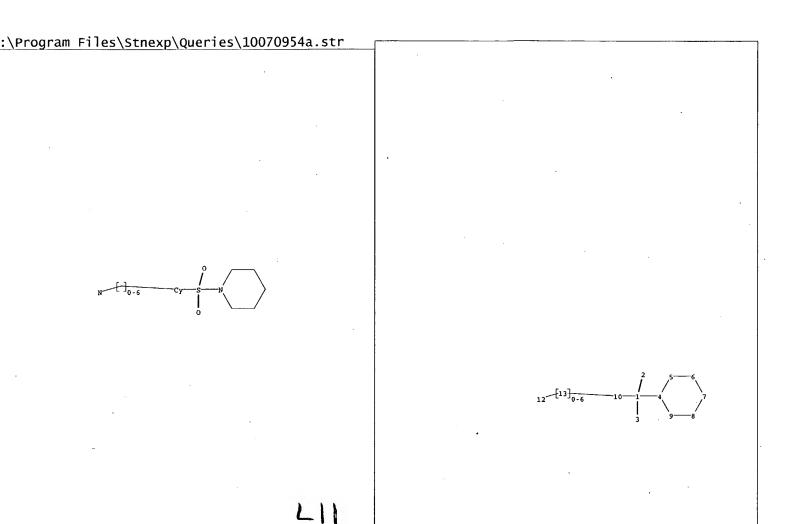
chain bonds:
    1-2 1-3 1-4 1-10 10-16 11-12 12-13 15-16

ring/chain bonds:
    12-15

ring bonds:
    4-5 4-9 5-6 6-7 7-8 8-9

exact/norm bonds:
    1-2 1-3 1-4 1-10 4-5 4-9 5-6 6-7 7-8 8-9 10-16 11-12 12-13 12-15 15-16
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Match level:
1:CLASS 2:CLASS 3:CLASS 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 11:Atom 12:CLASS 13:CLASS 15:CLASS 16:CLASS



hain nodes:

1 2 3 10 13
ing nodes:

4 5 6 7 8 9 12
hain bonds:

1-2 1-3 1-4 1-10 10-13 12-13

ing bonds : 4-5 4-9 5-6 6-7 7-8 8-9

xact/norm bonds: 1-2 1-3 1-4 1-10 4-5 4-9 5-6 6-7 7-8 8-9 10-13 12-13

1:0,5

atch level:
1:CLASS 2:CLASS 3:CLASS 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom
12:CLASS 13:CLASS